

Mainstreaming Nutrition in Poverty Reduction Strategy Papers: What Does It Take?

A Review of the Early Experience

Meera Shekar and Yi-Kyoung Lee

December 2006



**MAINSTREAMING NUTRITION INTO
POVERTY REDUCTION STRATEGY PAPERS:
WHAT DOES IT TAKE?**

A Review of the Early Experience

Meera Shekar and Yi-Kyoung Lee

December 2006

Health, Nutrition and Population (HNP) Discussion Paper

This series is produced by the Health, Nutrition, and Population Family (HNP) of the World Bank's Human Development Network. The papers in this series aim to provide a vehicle for publishing preliminary and unpolished results on HNP topics to encourage discussion and debate. The findings, interpretations, and conclusions expressed in this paper are entirely those of the author(s) and should not be attributed in any manner to the World Bank, to its affiliated organizations or to members of its Board of Executive Directors or the countries they represent. Citation and the use of material presented in this series should take into account this provisional character. For free copies of papers in this series please contact the individual author(s) whose name appears on the paper.

Enquiries about the series and submissions should be made directly to the Managing Editor, Nicole Klingen (Nklingen@worldbank.org). Submissions should have been previously reviewed and cleared by the sponsoring department, which will bear the cost of publication. No additional reviews will be undertaken after submission. The sponsoring department and author(s) bear full responsibility for the quality of the technical contents and presentation of material in the series.

Since the material will be published as presented, authors should submit an electronic copy in a predefined format (available at www.worldbank.org/hnppublications on the Guide for Authors page). Drafts that do not meet minimum presentational standards may be returned to authors for more work before being accepted.

For information regarding this and other World Bank publications, please contact the HNP Advisory Services at healthpop@worldbank.org (email), 202-473-2256 (telephone), or 202-522-3234 (fax).

© 2006 The International Bank for Reconstruction and Development / The World Bank
1818 H Street, NW
Washington, DC 20433

All rights reserved.

Health, Nutrition and Population (HNP) Discussion Paper

Mainstreaming Nutrition into Poverty Reduction Strategy Papers: What Does It Take? *A Review of the Early Experience*

Meera Shekar^a and Yi-Kyoung Lee^b

^a Senior Nutrition Specialist, Health, Nutrition and Population, Human Development Network, The World Bank, Washington, DC, USA

^b Health Specialist, Human Development, Africa Region, The World Bank, Washington, DC, USA

December 2006

Abstract: The development of PRSPs and their multisectoral nature offer a unique opportunity for nutrition. There is a strong bi-directional relationship between nutrition status and economic growth; high economic growth (especially if it is equitable growth) improves nutrition, and improved nutrition can be a driver of economic growth. Nutrition interventions are multisectoral, have high benefit-cost ratios, and target themselves to the poor. Malnutrition has been identified as the non-income face of poverty and is the agreed upon indicator for monitoring MDG 1. This suggests that nutrition interventions should become an integral component—part of the “mainstream”— of poverty reduction strategies

This paper reviews 40 full PRSPs with regard to whether these strategy papers (1) recognize undernutrition as a development problem in the country, (2) whether they use nutrition information for poverty analysis, and (3) whether the PRSP includes specific nutrition activities (policies, strategies, and programs) to deal with the unique nutrition problems in each country. The review shows that three quarters of the PRSPs recognize that undernutrition is a development problem that leads to loss of human capital and/or productivity. Also, many PRSPs, either explicitly or implicitly, include country nutrition profiles in their poverty analysis. Consequently, a majority of PRSPs include strategies and specific actions to mitigate the effects of malnutrition. However, there appears to be little prioritization or sequencing of proposed actions. More importantly, the strategies and actions included in PRSPs often do not reflect an appropriate response to the nature of the nutrition problem in the country. In a quarter of countries with macronutrient deficiencies and about 40% of countries with micronutrient deficiencies, the PRSPs fail to address these two problems. Moreover, tackling nutrition issues requires greater institutional capacity and budget allocations than currently seem to exist. Gross mismatches between the causes of malnutrition and responses to the nutrition problem inevitably lead to a lack of impact and a waste of resources, which will further contribute to the marginalization of nutrition in future PRSPs.

Keywords: Poverty Reduction Strategy Papers (PRSPs), Nutrition

Disclaimer: The findings, interpretations and conclusions expressed in the paper are entirely those of the authors, and do not represent the views of the World Bank, its Executive Directors, or the countries they represent.

Correspondence Details: Meera Shekar, The World Bank, MSN G7-701, 1818 H Street, NW, Washington DC 20433; Tel: 202-473-6029; Fax: 202-522-3234; e-mail: mshekar@worldbank.org

Table of Contents

Acknowledgements	vii
1. Introduction and Background	1
1.1. Poverty Reduction Strategy Papers	1
1.2. The Link between Nutrition and Poverty Reduction Strategies.....	2
2. Objectives of This Review	6
3. Scope and Methodology.....	7
4. Identifying Countries that Have a Nutrition Problem of Public Health Significance.....	9
5. Findings.....	12
5.1. Do PRSPs recognize malnutrition as a development problem?.....	13
5.2. Is nutrition an integral part of the poverty analyses for PRSPs?	13
5.3. Are the multiple determinants of malnutrition identified?.....	15
5.4. Is the rhetoric on nutrition followed-up with proposed strategies/actions?.....	16
5.5. Do proposed actions/strategies respond to the nature of the nutrition problem?...	17
5.6. Are proposed actions prioritized or are costs indicated?	17
5.7. Does capacity constrain proposed actions?.....	18
5.8. Are nutrition indicators used to monitor PRSP progress?	20
5.9. Does access to nutrition information strengthen chances for action?	20
5.10. Do good intentions translate into budget allocations?	20
6. Limitations of the Review.....	22
7. Conclusions and Recommendations.....	23
References.....	25
Annex 1. Nutrition Profiles of Countries with Full PRSPs	27

List of Boxes

Box 1. Zambia's PRSP	13
Box 2. Cambodia PRSP: Excerpts	15
Box 3. Malawi's PRSP: Nutrition Activities Proposed	18
Box 4. Five Steps Towards Including Nutrition in Country PRSPs	24

List of Figures

Figure 1. Countries with Full PRSPs that Have Different Combinations of Nutrition Problems	11
Figure 2. PRSPs that Recognized Malnutrition as a Development Problem.....	13
Figure 3. PRSPs that Included Malnutrition in the Definition of Poverty.....	14
Figure 4. PRSPs that Used Nutrition Status in the Poverty Analysis	14
Figure 5. Nutrition Activities Proposed in PRSPs by Presence of Bank Supported Projects	19
Figure 6. Types of Nutrition Monitoring Indicators Proposed in PRSPs	20

List of Tables

Table 1. The Copenhagen Consensus Ranks the Provision of Micronutrients as a Top Investment	3
Table 2. What Are the Benefit/Cost Ratios for Community Nutrition Interventions?	3
Table 3. Nutrition’s Contributions to the Attainment of the MDGs.....	5
Table 4. Cut-offs for Identifying Nutrition Problems of Public Health Significance.....	9
Table 5. Countries with Full PRSPs and Nutrition Problems of Public Health Significance	10
Table 6. Nutrition Content in PRSPs	12
Table 7. Nutrition Strategies/Actions Included in Country PRSPs	16
Table 8. PRSPs that do not Recognize that Malnutrition Undermines Productivity are Less Likely to Include Budgets for Nutrition Activities	21

Acknowledgements

Thanks are due to Harold Alderman (Lead Human Development Economist, World Bank) and Roger Shrimpton (Secretary, United Nations Standing Committee on Nutrition) for their valuable peer-review comments and suggestions. Many thanks are also due to Claudia Rokx (Lead Health Specialist, World Bank), Eleonora Genovese (Consultant, World Bank), and Predrag Djovic (Consultant, World Bank) for their start-up work and helpful comments on earlier drafts of the document.

The authors are grateful to the Bank-Netherlands Partnership Program (BNPP) for its generous support for printing this paper.

1. Introduction and Background

1.1. POVERTY REDUCTION STRATEGY PAPERS

In December 1999, the World Bank (WB) and the International Monetary Fund (IMF) approved a new approach to development assistance that links debt relief to poverty reduction in low-income countries: the Poverty Reduction Strategy Papers (PRSPs). As one of the requirements for receipt of continued concessional lending and/or debt relief under the Heavily Indebted Poor Countries (HIPC) Initiative,¹ countries are required to prepare PRSPs.

This comprehensive development framework is set to serve as the framework for domestic policies and programs to reduce poverty as well as for coordinating development aid. Development of PRSPs is to be based on five principles: They should be country-driven, results oriented, comprehensive in recognizing the multisectoral dimensions of poverty, prioritized (so that implementation is feasible) and based on a long-term perspective of poverty reduction. In addition, the preparation of PRSPs should involve wide consultation with stakeholders and coordination with donors. PRSPs are also mandated to include countries' priorities in both fiscal and institutional terms, implementation of which is supported by the World Bank's Poverty Reduction Support Credit (PRSC) and the International Monetary Fund's Poverty Reduction Growth Facility (PRGF). Given the importance of the global development community's commitment to sustainable human development and, in turn, the eradication of poverty, countries are encouraged to align their PRSPs with the Millennium Development Goals (MDGs).²

As of December 2004, 55 countries had developed either interim and/or full PRSPs, including 27 out of a total of the 38 countries that were eligible for the HIPC initiative. This review limits itself to the 40 countries that had both developed full PRSPs by that date *and* had a nutrition problem of public health proportions; it does not include the 15 countries that had either developed interim PRSPs, or had less pronounced nutrition problems. At this time, fifteen countries (Benin, Bolivia, Burkina Faso, Ethiopia, Ghana, Guyana, Madagascar, Mali, Mauritania, Mozambique, Nicaragua, Niger, Senegal, Tanzania, and Uganda) had reached the "completion point" for HIPC and as a result,³ have received irrevocable debt relief that is expected to be programmed in consonance with the PRSPs.

¹ Eligibility criteria for HIPC initiative include; (i) IDA country eligible for IMF Poverty Reduction Grant Facility; (ii) heavily indebted (i.e., debt above 150% of export or above 250% of government revenues) 1 (iii) Good track record of reform and development of a PRSP. For more information see <http://www.worldbank.org/debt>.

² The Millennium Development Goals (MDGs) are a set of internationally agreed goals that countries and institutions have committed to try to reach by 2015. For more information about MDGs, see <http://www.developmentgoals.org/>.

³ To reach the completion point, countries are further required to maintain macroeconomic stability and carry out structural and social reforms, in addition to the satisfactory implementation of PRSPs.

1.2. THE LINK BETWEEN NUTRITION AND POVERTY REDUCTION STRATEGIES

The PRSP development process and the multisectoral nature of poverty reduction strategies offer a unique opportunity for the inclusion of nutrition interventions for many reasons. First, **the relationship between nutrition and economic growth is bi-directional, meaning that improved nutrition is not only an expected outcome of income growth, but can also be a powerful driver of economic growth.** The positive economic impacts of improved nutrition are numerous and there are at least three ways in which the gains from improved nutrition manifest themselves: (i) direct gains in productivity arising from improvements in physical stature and strength, as well as improvements in micronutrient status, (ii) indirect gains arising from links between nutritional status, schooling and cognitive development, as well as subsequent adult labor productivities, and (iii) savings of resources currently directed to health care, disease treatment and other problems associated with malnutrition (Behrman et al., 2004).

Undernutrition retards cognitive development and undermines educational attainment and labor productivity, with adverse implications for income and economic growth. Malnourished children have lower IQs and lower school performance. They grow to become malnourished adults with poor physical and cognitive productivity and lower lifetime earning potential, which at an aggregate level can severely impair economic growth. For example, in Zimbabwe, stunting has been shown to reduce lifetime income by 7-12%, because of its association with a seven-month delay in school completion and 0.7 loss in grade attainment (Alderman et al., 2003). Iron deficiency in adults has been estimated to decrease productivity by 5-17%, depending on the nature of the work performed (Horton, 1999). Data from ten developing countries have shown that the median loss in reduced work capacity associated with anemia in adults is equivalent to 0.6% of GDP, while an additional 3.4% of GDP is lost due to the effects of anemia on cognitive development in childhood (Horton and Ross, 2003). The impact of iodine deficiency disorders (IDD) on cognitive development alone has been associated with productivity losses totaling approximately 10% of GDP (Horton 1999). Conversely, improved nutrition has the potential to drive improvements in economic growth by strengthening human capital. A recent study has shown that each child prevented from being born with low birth weight is worth \$510⁴ in developing economies (Behrman et al., 2004). At the country level, studies have estimated that preventing micronutrient deficiencies in China and India would save these two countries US\$5 and \$2.5 billion per year, respectively.

Second, as documented by the Copenhagen Consensus, **the benefit-cost ratios of investing in nutrition are high.** The Copenhagen Consensus ranked the expected rates of return from a wide spectrum of development investments, including nutrition,

⁴ The estimated benefit of reduced low birth weight has been re-calculated from the earlier estimation of \$580 to \$510, to adjust for children who did not die early as a consequence of low birth weight.

education, water and sanitation, trade reform and private sector deregulation interventions. Of these development investments, the provision of micronutrients was identified as the second most cost-effective global development opportunity to meet the world's development challenges. Other nutrition investments also ranked high (see Table 1 below).

Table 1. The Copenhagen Consensus Ranks the Provision of Micronutrients as a Top Investment

Rating	Challenge	Opportunity
Very Good	1. Diseases	Control of HIV/AIDS
	2. Malnutrition and hunger	Providing micronutrients
	3. Subsidies and Trade	Trade liberalization
	4. Diseases	Control of malaria
Good	5. Malnutrition and hunger	New agricultural technologies
	6. Sanitation and Water	Small-scale water technologies
	7. Sanitation and Water	Community-managed systems
	8. Sanitation and Water	Research on water in agriculture
	9. Government	Lowering cost of new business
Fair	10. Migration	Lowering barriers to migration
	11. Malnutrition and hunger	Improving infant/child malnutrition
	12. Malnutrition and hunger	Reducing the prevalence of low birth weight
	13. Diseases	Scaling up basic health services
Poor	14-17 Migration/Climate	Various

Source: Bhagwati et al. 2004.

The annual cost of implementing most micronutrient fortification and supplementation programs is very low, and the benefits of reduced mortality and morbidity as well as the increased productivity associated with these programs are very high. Assuming a 3-5% discount rate and including a range of private and social costs, benefits can be anywhere from 6 to 200 times greater than the costs of implementing the programs, depending on the nature of the intervention (Behrman et al., 2004). The benefit-cost ratios for some nutrition interventions are summarized below in Table 2.

Table 2. What Are the Benefit/Cost Ratios for Community Nutrition Interventions?

Intervention programs	Benefits/costs
Breastfeeding promotion in hospitals	6-67
Integrated child care program	9-16
Iodine supplementation (women)	15-520
Vitamin A supplementation (children<6y)	4-43
Iron fortification (per capita)	176-200
Iron supplementation (per pregnant women)	6-14

Source: Behrman et al. 2004.

Third, unlike poverty rates which tend to decline twice as fast as per capita GNP growth rates, **malnutrition declines at half the rate of income growth**. Income growth does contribute to improving nutrition outcomes, but the trickle-down effect is slow, long and indirect. In Tanzania, for example, even under a very optimistic income growth scenario of 5% per capita GDP growth (overall GDP growth of 7.9%), it will take until 2026 to

reach the nutrition MDG, and under a more realistic scenario based on 2.1% per capita GDP growth, the MDG target will not be reached until 2064. Similar projections for India suggest that it will take until 2023 for India to achieve the MDGs under the best of circumstances (5% per capita GDP growth). Therefore, while income growth does improve nutrition, macro-economic policies alone will not suffice to achieve the MDGs, and nutrition interventions are necessary to address non-income poverty.

Fourth, experience to-date demonstrates that **the five principles guiding PRSP development, as outlined in section 1.1., also apply to designing interventions to improve nutrition outcomes.** A long-term perspective characterized by consistent and sustained actions in nutrition is essential to break the intergenerational cycle and maximize impact. Evidence has shown that nutrition interventions are most successful when they are locally driven. Depending on the epidemiology of malnutrition in the country, nutritional status can be effectively improved through each of the multisectoral determinants of nutrition—including, but not limited to, health, agriculture, social protection, community empowerment and community driven development, and infrastructure. Partnerships are, therefore, critical to nutrition improvement.

Fifth, **increased emphasis on nutrition can strengthen the PRS process, both by highlighting the non-income dimension of poverty and building human capital for future economic development.** For example, looking at malnutrition as both a cause and an outcome of poverty sheds new light on poverty by revealing how households utilize available income for human capital development. Also, because malnutrition rates are highest among the poor and the vulnerable, focusing on malnutrition intrinsically provides a mechanism to target these populations and break the intergenerational transfer of poverty (SCN, 2004). Therefore, poverty reduction through improved nutrition should be deemed a productive investment rather than a welfare or consumption issue.

Lastly, **the link between nutrition and poverty is further underscored in the definition of the first MDG.** Goal 1 aims to “eradicate extreme poverty and hunger.” The two targets under this goal are to halve, between 1990 and 2015:

- the proportion of people whose income is less than one dollar a day;
- the proportion of people who suffer from hunger.

The first target refers to income poverty, and the second one addresses non-income poverty. The two indicators chosen for measuring progress against hunger reduction are:

- the prevalence of underweight children under five years of age; and
- the proportion of population below minimum level of dietary energy consumption.

Yet, most assessments of progress towards the MDGs to-date have focused primarily on the income-poverty target.⁵ Furthermore, several assessments suggest that poor nutrition impinges on the achievement of the other MDGs as outlined in Table 3 below.

Table 3. Nutrition's Contributions to the Attainment of the MDGs

Goal 1 – Eradicate extreme poverty and hunger
<ul style="list-style-type: none"> ▪ Malnutrition erodes human capital, reduces resilience to shocks and reduces productivity (impaired physical and mental capacity).
Goal 2 – Achieve universal primary education
<ul style="list-style-type: none"> ▪ Malnutrition reduces mental capacity. ▪ Malnourished children are less likely to enroll in school or more likely to drop out. ▪ Current hunger and malnutrition reduces school performance.
Goal 3 – Promote gender equality and empower women
<ul style="list-style-type: none"> ▪ Better-nourished girls are more likely to stay in school and to have more control over future choices.
Goal 4 – Reduce child mortality
<ul style="list-style-type: none"> ▪ Malnutrition is directly or indirectly associated with more than 50% of all child mortality. ▪ Malnutrition is the main contributor to the burden of disease in the developing world.
Goal 5 – Improve maternal health
<ul style="list-style-type: none"> ▪ Maternal health is compromised by an anti-female bias in allocation of food, health and care. ▪ Malnutrition is associated with most major risk factors for maternal mortality.
Goal 6 – Combat HIV/AIDS, malaria, and other diseases
<ul style="list-style-type: none"> ▪ Malnutrition hastens onset of AIDS among HIV-positive. ▪ Malnutrition weakens resistance to infections and reduces malarial rates. ▪ Undernutrition reduces malaria and diarrhea survival rates.

Source: Adapted from SCN 2004.

⁵ For some countries the MDGs are ambitious, but may be reachable with sustained efforts. For other countries they are clearly unreachable. Many reviews of the overall progress of countries towards the MDGs suggest that the first goal is achievable (World Bank, 2003a; World Bank, 2004, to name a few). However, most of these analyses, including World Development Report 2004, focus primarily on the income poverty goal and the few that do look at the non-income poverty goal seem overly optimistic (World Bank 2004) given observed trends in under-nutrition.

2. Objectives of This Review

Several reviews of PRSPs have been done over the last five years (IMF and World Bank 2002; DFID HSRC 2003; OED 2004; Williams and Duncan 2001; Van Holst Pellekaan 2001; Schmidt 2002; De Haan 2002; WHO 2002, 2004; World Bank 2003b; FAO 2003; Hewitt and Gillson 2003). Although they vary widely in approach and structure, objectives are typically of two-types: (1) *process reviews* to examine achievements and challenges of PRSPs, and (2) *sector/program reviews* to assess the scope and quality of the specific sectors/programs in the PRSPs, including suggesting constructive ways to strengthen sectoral themes within PRSPs.

This review adds to that literature in the following ways:

- It identifies countries with nutrition problems of moderate or severe public health significance wherein poor nutrition could impinge on economic productivity;
- For the countries where nutrition problems are likely to impinge on economic growth, it examines the degree to which nutrition issues are addressed in these country PRSPs; and
- It suggests how future PRSPs can be strengthened vis-à-vis nutrition and hence may be a useful resource for countries that are either developing new PRSPs or updating them.

3. Scope and Methodology

The authors of this review start with the premise that malnutrition is not a problem of public health significance in all countries. The scope of the review is, therefore, focused on countries that have developed full PRSPs *and* that have nutrition problems (stunting, underweight, and/or micronutrient deficiencies) of moderate or severe public health significance, such as to slow their economic growth. The review recognizes that PRSPs are multisectoral comprehensive development frameworks and therefore are not necessarily the appropriate channel for extensive discussions of nutrition problems, strategies or programs. However, in countries where nutrition problems are large scale enough to have a profound effect on economic development, growth and poverty, the authors' expectations were that malnutrition would be recognized as a key constraint to poverty reduction, and addressed accordingly in the PRSP. The authors in no way wish to imply that countries with less severe nutrition problems should not address them in their PRSPs, but rather wish to underline the importance that needs to be accorded to nutrition in the countries where the problem is of significant magnitude.

As of December 23, 2004, a total of 55 countries had developed full or interim PRSPs. Of these, 40 countries satisfy both of the following criteria and are included in this review:

- Countries that have developed full PRSPs as of December 23, 2004 (43 out of a total of 55) (Annex 1)
- Countries that have malnutrition problems of either moderate or severe public health significance (40 out of 43) (Table 5)

Countries that have developed full PRSPs but do not have significantly large nutrition problems (3 out of 43 countries) are purposely excluded from the review. The paper examines PRSPs from 40 countries to assess their handling of the following three categories:

- ***Recognition of undernutrition as a development problem***
 - Does the PRSP recognize undernutrition as a development problem that negatively affects human capital formation by causing ill health and/or by reducing economic growth and productivity?
- ***Use of nutrition information for poverty analysis***
 - Does the PRSP include nutrition in the definition of poverty? In addition to income poverty, does the PRSP utilize nutritional status/non-income poverty indicators for poverty analysis?
 - What kind of nutrition information is included in the PRSP? Does the PRSP use nutrition indicators for targeting or for progress monitoring?
 - Does the PRSP identify the determinants of undernutrition in the country?

- ***Support for appropriate nutrition policies, strategies, and programs in the PRSP***
 - Does the PRSP identify appropriate policies, strategies, and programs to address the nature and determinants of nutrition problems in the country? Are they linked to sectors other than health?
 - Does the PRSP specify a budgetary allocation to implement planned nutrition activities?

In undertaking the review, the authors have necessarily had to make some subjective judgments as to what is classified as a nutrition activity and what is not. In general, any *specific*⁶ strategy, policy, or program that has the potential to improve nutritional status is counted as a nutrition activity.⁷ These are then grouped into one of four broad sets of activities related to:

- *general nutrition*;
- *micronutrient deficiency prevention*;
- *capacity building, policy, and monitoring and evaluation (M&E)*; and
- *food-related interventions*.

General nutrition covers any nutrition activities that aim to improve macronutrient deficiencies and/or overall nutrition status, except for untargeted distribution of food. When the key objective is to improve micronutrient status, activities are classified as *micronutrient deficiency prevention*. Any activities, including budgeting, related to the development of nutrition policy, strategy or relevant capacity building in human resources and institutions, as well as monitoring and evaluation, are classified as *capacity building, policy and M&E*. *Food-related* activities include strategies and programs that promote increases in production, distribution, and consumption of food, including direct and indirect provision of food (e.g., food subsidy, food for work, school feeding). Examples from country PRSPs are quoted throughout the review.

⁶ For example, if increased food production under Agricultural and Rural Development strategies is not *specifically* linked to food insecurity, but is linked to increased income only, then this is not considered a nutrition activity, even though higher income is likely to improve nutrition eventually.

⁷ Water and/or sanitation interventions, which may have the potential to improve nutrition outcomes were included in all 40 PRSPs reviewed and are therefore not included here as a nutrition intervention, unless it was specifically mentioned as a strategy for improving nutrition (as was the case in Burkina Faso, the Gambia, Malawi, Mali, Mozambique, Loa, Georgia, Bolivia, Nicaragua, and Djibouti)

4. Identifying Countries that Have a Nutrition Problem of Public Health Significance

The cut-offs for identifying problems of moderate and severe public health significance for stunting, underweight, wasting, IDD, iron deficiency anemia (IDA), and vitamin A deficiency (VAD) are laid out in Table 4 below.⁸

Table 4. Cut-offs for Identifying Nutrition Problems of Public Health Significance

Category of public health significance	Stunting ^a (%)	Under-weight ^a (%)	Wasting ^a (%)	Over-weight ^b (%)	IDD ^c (%)	IDA ^c (%)	VAD ^c (%)
Severe	≥40	≥30	≥15	≥10	≥30	≥40	≥20
Moderate	30-39	20-29	10-14	5-9	20-29	20-39	10-20
Mild	20-29	10-19	5-9	3-4	5-19	5-19	2-9

Source/definition:

^a WHO, 1995

^b By definition only 2.3% of the children should have Weight-for-Height Z score > 2. Countries with more than 1, 2, and 3 time(s) higher than this normal prevalence are, respectively, categorized as having mild, moderate, and severe levels of overweight.

^c WHO, 2000⁹

Table 5 below shows the number of countries with nutrition problems of public health significance (see Annex 1 for details). Out of 43 countries with full PRSPs, 24 and 26 countries respectively have at least moderate stunting and underweight problems; the problem is of *severe* public health significance in approximately half of these countries. In addition, 14 countries also have moderate level of wasting which indicates a current acute nutrition problem at the time of survey. Only 20% of countries reviewed here are on track to achieve the nutrition MDG of halving underweight prevalence among children under five; if the current trend continues, none of the countries with the full PRSPs in Middle East and North Africa (MNA) and South Asia (SAR) regions are going to decrease underweight prevalence at rates that would meet the MDG targets.

However, malnutrition is not just manifested in stunting and underweight. Overnutrition is an emerging problem in about a fifth of the 40 countries with full PRSPs, even among low-income families. In addition, micronutrient deficiencies pose major health problems. While IDD is limited to countries in Africa region (AFR), Europe and Central Asia region (ECA), and SAR, IDA and VAD are prevalent across all regions. All countries

⁸ Given the emerging nature of non-communicable diseases, their long-term impacts on productivity, and the strong links with obesity, the cut-off used in this review for identifying countries with an overweight problem is mild overweight.

⁹ WHO recently suggested a new Vitamin A deficiency cut-off to be used in defining a “public health problem.” This is defined as 15% or more of children with serum retinol levels <0.7µmol/L. However, in this report the moderate cut-off point of 10% is used for consistency with other micronutrient deficiencies. Only five countries—Georgia, Armenia, Vietnam, Chile, and Paraguay—have 10-14% of children with serum retinol levels <0.7µmol/L between 10-14%.

with full PRSPs in AFR and East Asia and the Pacific Region (EAP) and more than half of the countries in other regions have IDA and VAD of moderate or severe public health significance.

Table 5. Countries with Full PRSPs and Nutrition Problems of Public Health Significance^a

	Full-PRSPs (No.)	Macronutrient problems				Micronutrient problems			
		Stunting ≥30% (40%)	Underwt ≥20% (30%)	Wasting ≥10% (15%)	Overwt ≥3% (10%)	MDG on track ^b	IDD ≥20% (30%)	IDA ≥20% (40%)	VAD ≥10% (20%)
AFR	20	15 (7)	19 (7)	6 (0)	3 (0)	4	11 (1)	20 (20)	20 (19)
EAP	4	3 (2)	3 (3)	2 (2)	1 (0)	1	0 (0)	4 (2)	4 (3)
ECA	9	2 (0)	0 (0)	1 (0)	2 (0)	2	3 (0)	5 (2)	5 (1)
LAC	4	0 (0)	0 (0)	1 (0)	1 (0)	2	0 (0)	3 (2)	2 (1)
MNA	2	1 (1)	1 (1)	2 (0)	1 (0)	0	0 (0)	1 (1)	1 (1)
SAR	4	3 (2)	3 (3)	2 (0)	1 (0)	0	2 (1)	3 (3)	3 (3)
Total	43	24 (12)	26 (14)	14 (2)	9 (0)	9	16 (2)	36 (30)	35 (28)

^a Numbers in () represent countries with the respective nutritional problem at the level of severe public health significance

^b Countries with more than 2.7% annual average reduction of underweight among children <5y.

Calculation is based on data available during 1990-2003. 4 countries in ECA (i.e., Bosnia-Herzegovina, Georgia, Moldova, and Tajikistan), 1 country in MENA (i.e., Djibouti), and 1 country in SAR (i.e., Bhutan) do not have enough data to calculate trend of underweight.

Of the 43 countries initially included in this review that have full PRSPs, only three countries, namely Bosnia-Herzegovina, Moldova, and Serbia & Montenegro, do not have any nutrition problems of public health significance.¹⁰ The other 40 countries have combinations of various nutrition problems and would therefore benefit from addressing these issues in their PRSPs (see Figure 1 below).

¹⁰ Bosnia-Herzegovina, Moldova, and Serbia & Montenegro do not have micronutrient deficiency data. However, given that they have relatively low under-five mortality rates (18, 32, and 19 per 1,000 live births, respectively), it is unlikely that they would have vitamin A deficiency of public health significance; hence they are dropped from further review.

5. Findings

Table 6 summarizes the extent to which nutrition issues are addressed in the 40 full PRSPs reviewed here.

Table 6. Nutrition Content in PRSPs

Region	AFR	EAP	ECA	LAC	MNA	SAR	Total
Number of PRSPs Reviewed	20	4	6	4	2	4	40
Mention undernutrition as a development problem	13	4	4	4	1	3	29
▪ Due to a loss of human capital	12	4	2	3	1	2	24
▪ Due to a loss of productivity	5	1	2	3	1	2	14
Include nutrition in the definition of poverty	16	3	1	3	2	1	26
Address nutrition in poverty analysis	16	3	3	3	2	1	28
▪ Identify determinants of malnutrition	13	4	4	2	1	3	27
Mention existing nutrition related policies and/or programs	13	4	4	4	0	4	29
Include any nutrition indicators for measuring progress or target	19	4	3	3	1	3	33
• Macronutrient deficiency indicators ^a	18	4	2	3	1	3	31
• Micronutrient deficiency indicators	4	1	1	0	1	1	8
Mention strategies and specific actions addressing nutrition problems ^b							
▪ General nutrition	16	2	4	4	2	3	31
▪ Micronutrient deficiency prevention	13	4	2	3	0	1	23
▪ Capacity building, policy, M&E	17	1	1	4	0	3	26
▪ Food-related	18	4	5	4	1	4	36
Allocate budgets for nutrition activities	9	2	1	2	0	0	14
▪ Allocate budgets for nutrition activities per se or for sectors or functions that include nutrition activities ^c	9	2	4	2	2	3	22

^a Macronutrient indicators used in PRSPs include stunting, underweight, wasting, low birth weight, and others indicating macronutrient deficiency (e.g., emaciation); micronutrient indicators include iron deficiency anemia, iodine deficiency disorders, iron/folate consumption, use of iodized salt, and vitamin A supplementation coverage.

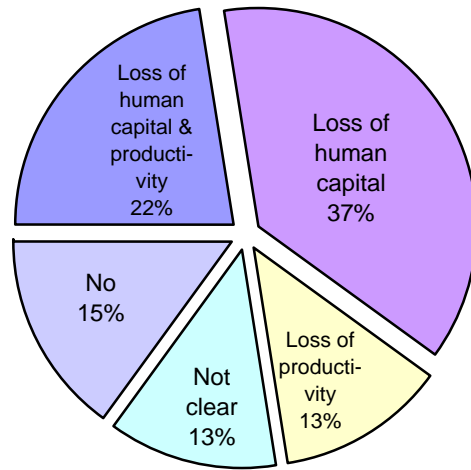
^b Strategies and actions for general malnutrition include nutrition education, information, education & communication, growth monitoring and promotion, infant and young child feeding, nutrition rehabilitation, integrated management of childhood illnesses, maternal and child health inputs, etc; those for micronutrient deficiency prevention include prevention of vitamin A, iron, iodine and other deficiencies; those for capacity building and M&E include policy/strategy formulation, capacity building (including human resource and training), M&E, research, multisectoral coordination, improved access to services; those for food security include anything related to food production, distribution, storage, supplementation, quality, food aid for social safety net programs, school feeding, etc.

^c Some PRSPs provide budget information at the sectoral (e.g., Ministry of Health) or functional level (e.g., maternal and child health) only.

5.1. DO PRSPs RECOGNIZE MALNUTRITION AS A DEVELOPMENT PROBLEM?

As shown in Figure 2, a large percentage of the PRSPs (73% or 29/40) state that malnutrition is a development problem. The majority of them (24/29) state that malnutrition is often a primary cause of ill health, and that it increases morbidity and mortality. Also, they recognize that this negatively affects human capital needed for economic growth. However, only about a third of countries (14/40) recognize direct productivity loss due to malnutrition and its impact on economic growth at an individual or country level. Some countries, such as Zambia, the Gambia, and Cambodia, clearly recognize the impact of malnutrition on their economic growth (see Box 1 for Zambia’s PRSP), but the failure on the part of so many other countries to make that same connection may explain why investment in nutrition rarely ranks high among priorities.

Figure 2. PRSPs that Recognized Malnutrition as a Development Problem



Box 1. Zambia’s PRSP

“Good nutrition is essential for healthy and productive lives and has a direct bearing on the economic performance of a country. The high level of poverty in Zambia has largely contributed to malnutrition, especially among young children. The vicious cycle of malnutrition exacerbated by poverty has negative effects on human and socio-economic development for the country. The consequences of poor nutrition are stunted mental and physical growth and development, poor health, poor reproductive performance, reduced productivity and potential, and increased risk of poverty.”

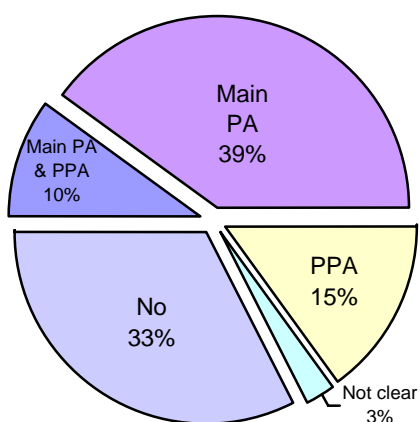
5.2. IS NUTRITION AN INTEGRAL PART OF THE POVERTY ANALYSES FOR PRSPs?

Many PRSPs use nutrition profiles in their poverty analysis explicitly and/or implicitly. For example, the Guyana PRSP states that

“...To account for the inherent weakness in using either consumption or income data as the sole measure of welfare, the PRSP will also discuss other indicators of well being, such as nutrition, life expectancy, and mortality, to the extent possible.”

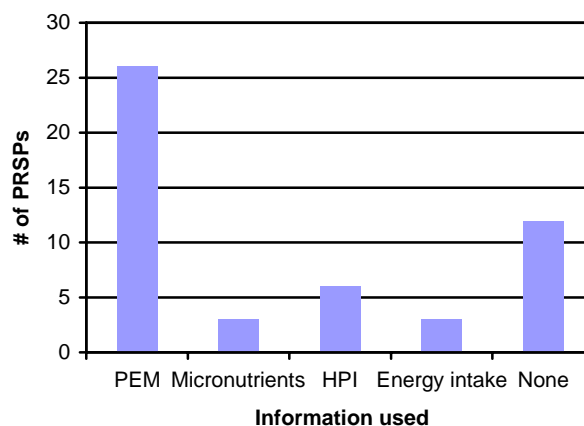
Not only is malnutrition¹² frequently included (26/40) in the definition of poverty (see Figure 3), but nutrition is also often discussed (28/40) as a part of the poverty analysis (see Figure 4). Twenty eight countries used at least one nutrition indicator¹³ to measure non-income poverty in their analysis; indicators for macronutrient deficiencies such as underweight, stunting, and wasting are most commonly used (26/28) (even though the technical terms used are not always clear). Six countries also used UNDP’s “human poverty index,” which includes the proportion of underweight children as an indicator of deprivation in a decent standard of living.¹⁴

Figure 3. PRSPs that Included Malnutrition in the Definition of Poverty



Note: PA=Poverty analysis, PPA=Participatory poverty analysis

Figure 4. PRSPs that Used Nutrition Status in the Poverty Analysis



Given the nature and wide scope of PRSPs, information about nutrition is, as expected, limited in these documents, as is also the case with other sectors. Despite this, **many PRSPs (16/40) look at equity issues around nutrition, i.e., rural vs. urban disparities (18/45), inter-regional disparities (16/40), all of which can provide important information for targeting poverty reduction efforts and interventions.** However, most PRSPs do not quantify the productivity losses attributable to undernutrition within

¹² The explicit term “malnutrition,” along with its indicators stunting and underweight, are used in definitions of poverty, as are implicit terms such as “food insecurity,” “insufficient food,” and “hunger.”

¹³ One of the most commonly used income poverty indicators, percentage of food poor, is the proportion of households whose annual per capita expenditure is not enough to buy a basket of food products that ensures the minimum energy requirement.

¹⁴ Human poverty index (HPI) is “a composite index measuring deprivations in the three basic dimensions captured in the human development index—a long and healthy life, knowledge and a decent standard of living. The proportion of underweight children is used as a component of ‘deprivation of a decent stand of living’ along with the percentage of population without sustainable access to an improved water source.” For more information about the HPI, please see technical notes and definitions in the Human Development Report (<http://hdr.undp.org/reports/global/2004/>)

that country. Zimbabwe and Tanzania are two notable exceptions. In the former, as stated in section 1.2, stunting has been shown to reduce lifetime income by 7-12%, iron deficiency in adults has been estimated to decrease productivity by 5-17%, and the impact of IDD on cognitive development alone has been associated with productivity losses totaling approximately 10% of GDP (Alderman et al., 2003). Just as most PRSPs fail to provide estimations of productivity loss due to malnutrition, they also tend to overlook the role of improved nutrition can play in driving economic growth. The Cambodia PRSP is an exception as it does mention that investing in nutrition could maximize resource utilization, potentially generating high economic returns with a 1:8 cost-benefit ratio, thereby contributing to poverty reduction. Making such arguments could substantially strengthen the case for resource allocations for nutrition.

5.3. ARE THE MULTIPLE DETERMINANTS OF MALNUTRITION IDENTIFIED?

Many cross-sectoral assessments assume that malnutrition is a result of food insecurity and can be addressed by improving food security. Encouragingly, **27 out of the 40 PRSPs reviewed include an assessment of the factors that can influence nutrition status**, though the assessments vary considerably in depth, rigor and quality. Also, many countries recognize the need for action through several sectors, including health, agriculture, social protection/welfare, and education.

The poverty analysis conducted in preparing the Cambodia PRSP (see excerpt in Box 2 below) illustrates how a close examination of the causes of malnutrition can empower governments to make more informed decisions.

Box 2. Cambodia PRSP: Excerpts

“Protein Energy Malnutrition is a widespread problem in Cambodia, affecting 45 percent of children aged 6-59 months and at least 20 percent of the women. Malnutrition is a silent emergency, leading to economic losses and deaths in the family. It is both a major cause and an outcome of poverty. By the second year of life, nearly half of Cambodian children are already malnourished (stunted) and micronutrient deficiency is widespread...”

“...among the general population, especially children and women, the main underlying causes of malnutrition are not primarily related to food availability, but rather to **poor feeding and caring practices and low access to health and environmental sanitation. Women therefore will be the key target group** for nutrition programmes... lack of dietary diversification is one of the factors contributing to high levels of malnutrition and micronutrient deficiencies in the country.” Other contributing factors include: low levels of education (particularly of girls and women), poor awareness of good health and nutrition practices, inadequate childcare and inappropriate weaning practices, high exposure to disease and lack of access to basic public health care infrastructure and services (DHS 2000). **The lack of nutrition and health education in particular, appears to be a major constraint influencing the poor nutritional status of vulnerable groups...**

5.4. IS THE RHETORIC ON NUTRITION FOLLOWED-UP WITH PROPOSED STRATEGIES/ACTIONS?

All 40 PRSPs reviewed include at least one nutrition related strategy and/or action, but there appears to be little prioritization or sequencing of actions. Promisingly, many countries recognize that nutrition issues need to be addressed through multiple sectors including Agriculture and Rural Development (ARD), Social Protection/Welfare (SPW), and Education, in addition to Health.

A little over three quarters of the countries include some activities that address general malnutrition, targeting mostly maternal and child nutrition, and more than a half of them include measures to address micronutrient deficiencies. Capacity building, policy and M&E activities to improve nutrition are also included in two thirds of the PRSPs reviewed here (see Table 7).

Table 7. Nutrition Strategies/Actions Included in Country PRSPs

General nutrition programs	AFR	Guinea	Zambia	Azerbaijan	MNA
	Benin	Madagascar	EAP	Georgia	Djibouti
	Burkina Faso	Malawi	Cambodia	LAC	Yemen
	Cameroon	Mali	Lao	Bolivia	SAR
	Chad	Mauritania	ECA	Guyana	Nepal
	Ethiopia	Mozambique	Albania	Honduras	Pakistan
	Gambia	Senegal	Armenia	Nicaragua	Sri Lanka
	Ghana	Tanzania			
Micronutrient deficiency prevention programs	AFR	Guinea	Niger	Vietnam	Bolivia
	Benin	Madagascar	Zambia	ECA	Honduras
	Burkina Faso	Malawi	EAP	Azerbaijan	Nicaragua
	Cameroon	Mali	Cambodia	Krygyz Rep.	SAR
	Chad	Mauritania	Lao	LAC	Pakistan
	Ghana	Mozambique	Mongolia		
Capacity building, policy, and M&E	AFR	Guinea	Mozambique	Mongolia	Honduras
	Benin	Kenya	Rwanda	ECA	Nicaragua
	Burkina Faso	Madagascar	Senegal	Azerbaijan	SAR
	Cameroon	Malawi	Tanzania	LAC	Nepal
	Ethiopia	Mali	Zambia	Bolivia	Pakistan
	Gambia	Mauritania	EAP	Guyana	Sri Lanka
	Ghana				
Food programs	AFR	Madagascar	Zambia	Armenia	Nicaragua
	Benin	Malawi	EAP	Georgia	MNA
	Burkina Faso	Mali	Cambodia	Krygyz Rep.	Djibouti
	Chad	Mauritania	Lao	Tajikistan	SAR
	Ethiopia	Mozambique	Mongolia	LAC	Bhutan
	Gambia	Niger	Vietnam	Bolivia	Nepal
	Ghana	Senegal	ECA	Guyana	Pakistan
	Guinea	Tanzania	Albania	Honduras	Sri Lanka
	Kenya	Uganda			

5.5. DO PROPOSED ACTIONS/STRATEGIES RESPOND TO THE NATURE OF THE NUTRITION PROBLEM?

Strategies and actions included in PRSPs often do not reflect an appropriate response to the nutrition problem in the country. Almost a quarter of the countries (7/29) with general malnutrition problems, i.e. stunting, underweight and wasting do not discuss any direct nutrition interventions to address these problems. Forty percent of the countries with micronutrient deficiencies (15/38) have no micronutrient prevention activities mentioned in their PRSPs to remedy these deficiencies. Specifically, only about a third of countries with VAD (13/35) and IDA (13/34) of public health significance plan activities to reduce the prevalence of these two conditions. Even though lack of access to food is often not the major contributor to malnutrition, 90% of PRSPs include activities related to food security, such as improving food production and distribution, food subsidies or food supplementation programs as a way of improving nutrition.

Furthermore, because most undernutrition happens in the first two years of life and is essentially irreversible, actions after this age are unlikely to have any significant effect on nutrition. Given the cost of school feeding programs (making them difficult to scale up in any significant way) and the fact that undernourished children in African countries may not even attend school, the costs of such programs far outweigh the potential nutrition benefits. In spite of this, a third of the countries (half of them in Africa) mention school feeding in their PRSPs. While school feeding may be justifiable as an intervention to improve school attendance, it can not be justified as a nutrition intervention, unless supplementary school feeding is coupled with provision of iron supplementation and deworming medicine, as well as nutrition education.

Some of the aforementioned examples provide evidence that priorities and proposed investments are not always thought through. When strategies and actions do not accurately target the problem, the chances for impact are minimal. If nutrition is to leave the margins of poverty reduction and become a mainstream component of PRSPs, activities to improve nutritional status must be tailored to a country's specific problem(s) and demonstrate impact.

While many countries list potential nutrition actions, a number of countries such as Kenya, Rwanda, Uganda, Yemen, Tajikistan, and Bhutan do not, even though malnutrition is a major problem in each of them. In those countries that did mention some strategies/actions, the focus tends to be on improving aggregate food security, rather than enhancing nutrition security.

5.6. ARE PROPOSED ACTIONS PRIORITIZED OR ARE COSTS INDICATED?

One of the key principles of PRSPs—prioritization of actions—has not been adhered to in most cases. Proposing an overwhelming number of activities, irrespective of a country's capacity, is often counterproductive, leading to inaction. The activities must be prioritized and linked to clear institutional analyses and capacity development

plans, as well as financial resources. For example, Malawi has a very comprehensive assessment of nutrition in the PRSP, but the lists of proposed activities (see Box 3 below) appear overly ambitious given both financial and physical capacity issues in Malawi. Accordingly, follow-on actions in Malawi, as is the case in many other countries, continue to be driven by external development partners that focus mostly on vitamin A supplementation among preschool children and breastfeeding. Meanwhile, many of the country's other needs such as improving complementary feeding, which would help the country achieve nutrition MDG, have been left unaddressed.

Box 3. Malawi's PRSP: Nutrition Activities Proposed

As a part of the **essential health care package** under the primary health care

- Provision of Vitamin A
- Provision of iodine
- Anemia control
- Deworming

As a part of promotion of **good nutrition**

- Improve infant and young child feeding by promoting exclusive breastfeeding, complementary feeding, feeding during illness, convalescence through the baby friendly health initiative
- Diversification and modification of diet by community awareness campaigns on nutrition and food security and nutrition policy, and campaigns on HIV/AIDS and nutrition. Also, the gov't will organize short course for various workers in all districts on the prevention and control of malnutrition, train senior personnel on food and nutrition, and will review the curricular of extension agents, primary and secondary school teachers in order to incorporate nutrition issues.
- Strengthen institutional capacity: setting up the Food and Nutrition Council

As a part of **social safety net** programs

- Implement targeted nutrition intervention for malnourished children <5
- Implement food voucher for public works program
- Implement targeted nutrition programmes for malnourished vulnerable groups (moderately malnourished children and vulnerable pregnant and lactating women): therapeutic feeding in nutrition rehabilitation centers to severely malnourished children
- Provide information, education and communication for behavior change for good nutrition outcomes

As a part of **Education** programs

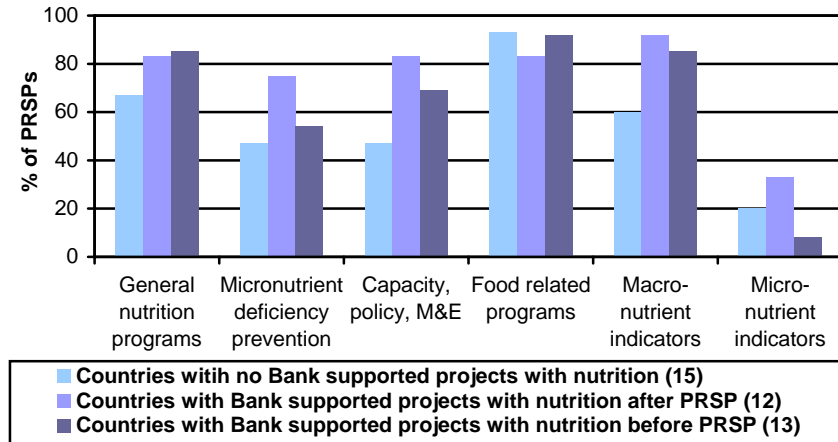
- Provide enriched porridge/food supplementation at preschool

5.7. DOES CAPACITY CONSTRAIN PROPOSED ACTIONS?

Institutional issues seem like a major constraint for nutrition actions. Several PRSPs mention institutional issues as key constraints for nutrition. Zambia mentions this explicitly, as does Mozambique. Many countries are aiming to address this issue seriously by proposing several options, ranging from setting up new directorates for nutrition (Mauritania) to setting up a National Nutrition Council (Madagascar). Uganda, Sri Lanka and Tanzania do not specifically mention institutional issues as an impediment to improving nutrition but they, nevertheless, loom large in these countries where nutrition is either housed in separate and often defunct institutions outside of the main

Ministry of Health, or in small under-staffed offices within the Ministry. Ethiopia did not address nutrition in any substantive way in its first two PRSCs, nor was nutrition well reflected in the PRSP. However, the intention to develop a nutrition strategy is manifest in the setting up of a Task Force on nutrition in preparation of PRSC-III. Several of the countries (such as Ethiopia) mention governance as a key constraint for nutrition.

Figure 5. Nutrition Activities Proposed in PRSPs by Presence of Bank Supported Projects



Note: Countries that have Bank supported projects with nutrition components are further categorized into those which prepared the project(s) *before PRSP* was written and those which prepared the project(s) almost *at the same time/after PRPS* was written.

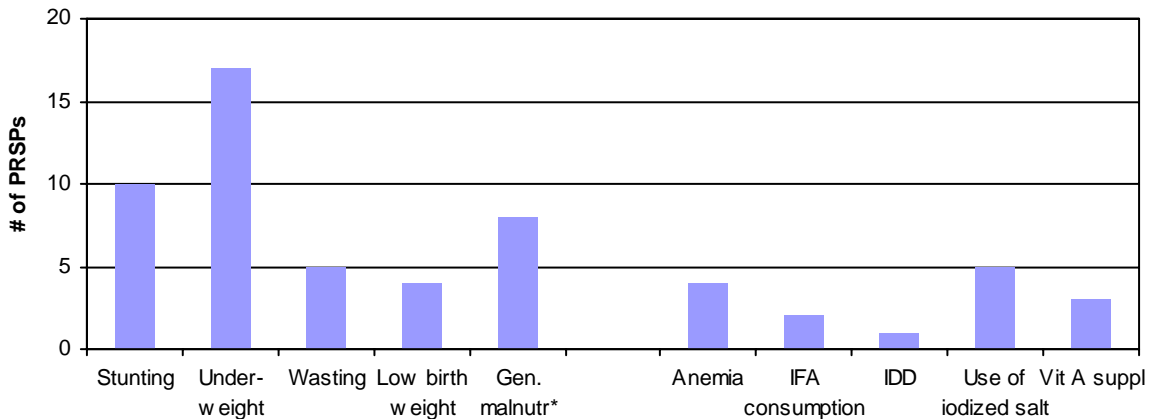
Even though the link is not directly attributable, the capacity built while implementing or preparing these project(s) that include nutrition components may influence whether nutrition is addressed in the PRSPs. In general, **the responsiveness of PRSPs to nutrition problems seems better among countries that have previously undertaken some nutrition investments.** As shown in Figure 5, countries with Bank project(s) that have nutrition components are more likely to address nutrition (including the institutional capacity for nutrition). Nutrition indicators are also more likely to be used to measure the progress and/or outcome of the PRSPs in these countries as compared to those without Bank investments. For example, the Gambia, Senegal, Zambia, Honduras, Nicaragua, Cambodia, and Vietnam—all of which have had stand-alone programs (Nutrition, Health, ECD, or Social Protection) that included a relatively large-scale nutrition component — have addressed nutrition issues in their PRSPs. Bangladesh (which is not included in this review because the PRSP is still being drafted), too, has had a large scale Bank-supported nutrition project, and is including nutrition as the first pillar of the PRSP. There are, however, some exceptions—countries that inadequately addressed nutrition in their PRSP but subsequently tackled the issue, and nations with a track record in nutrition that then gave it short shrift in the PRSP. In Madagascar, for instance, while the nutrition content of the PRSP is somewhat cursory, this situation is being remedied in the follow-on PRSC, based on experience from the Bank-supported SEECALINE project. Meanwhile, Uganda does not address nutrition issues in its PRSP even though it has had a Bank-

supported ECD project with a substantial nutrition component. Similarly, Tanzania neglects nutrition issues in the PRSP, in spite of having had a UNICEF-supported nutrition programme (the Iringa programme). On a positive note, the new PRS in Tanzania represents a significant strengthening of nutrition content.

5.8. ARE NUTRITION INDICATORS USED TO MONITOR PRSP PROGRESS?

It is encouraging to see that **most countries (33/40) include nutrition indicators as PRSP targets and/or progress monitoring indicators**, and presumably this is linked to the recognition of malnutrition as a development problem. The most commonly used indicators are underweight and stunting; the use of micronutrient-related indicators such as prevalence of anemia or consumption of iodized salt is very uncommon as shown in Figure 6.

Figure 6. Types of Nutrition Monitoring Indicators Proposed in PRSPs



Note: General malnutrition* includes 8 countries that used general terms for malnutrition such as “% malnourished children” which may refer to stunting, underweight or wasting”

5.9. DOES ACCESS TO NUTRITION INFORMATION STRENGTHEN CHANCES FOR ACTION?

When information is more readily accessible the chances of including nutrition in the PRSP are higher. Countries that do not discuss or advocate nutrition actions mention the need to generate more information on nutrition. Kenya is planning a nutrition survey by the statistics division. Mauritania, which had a weak M&E system in the Bank-supported Learning and Investment Loan (LIL) is working to strengthen it. Ethiopia has set up a Task Force on nutrition, and Mozambique is aiming to develop a food and nutrition strategy. The relation of such studies to subsequent actions is currently unclear.

5.10. DO GOOD INTENTIONS TRANSLATE INTO BUDGET ALLOCATIONS?

There seems to be a steep drop-off between good intentions (i.e. recognition of nutrition as a development problem, identification of strategies and actions, etc.) and plans to allocate budgets that can translate good intentions into action (Table

8). Countries that do not recognize malnutrition’s contribution to productivity are less likely to make budget allocations for nutrition. Only a third of the countries (14/40) specifically allocate budgets for (at least some of the proposed) nutrition activities; 22 countries assign block budgets to sectors (e.g., Ministry of Health) or functions (e.g., essential health package) where nutrition activities must compete for funds with a range of other activities that may seem (and perhaps are) easier to implement, more pressing, or more visible. Four countries, namely Kenya, Uganda, Tajikistan, and Bhutan, do not allocate any funds for nutrition activities.

Table 8. PRSPs that do not Recognize that Malnutrition Undermines Productivity are Less Likely to Include Budgets for Nutrition Activities

Recognition of malnutrition as a development problem	Budget		
	Include budget for nutrition activities	Include budgets for overall health/ agriculture sectors or functions only	Do not include any budgets for nutrition activities
Mention that malnutrition undermines			
Both productivity and human capital	4	5	
Productivity only	2	3	
Human capital only	6	9	
Do not clearly mention that malnutrition undermines productivity or human capital*	2	2	
Do not mention that malnutrition undermines productivity or human capital		3	4
Total number of PRSPs (%)	14 (35%)	22 (55%)	4 (10%)

Note: *PRSPs mention that *ill health* undermines productivity or human capital.

6. Limitations of the Review

This review has two key limitations. Firstly, this exercise was limited primarily to a desk-review of 40 full PRSPs, and the authors did not consult any country teams, though some contextual information has been added wherever available. Depending on the capacity of the countries and circumstances wherein these documents were produced (e.g., the first few PRSPs might be somewhat weaker than those recently produced), the reality might be somewhat different from what has been described here.

We have reviewed only *nutrition related activities* listed under the health, agriculture and rural development, social protection, and education sectors. Therefore, this review does not attempt to prioritize between nutrition and the needs of other sectors. It does, however, suggest ways to estimate nutrition's impact on economic growth in each country, a necessary precondition for planning and allocating resources for nutrition investments.

7. Conclusions and Recommendations

In general, nutrition seems to feature prominently in many PRSPs as a stated impediment to national development, and a majority of the PRSPs recognize that malnutrition negatively affects economic growth. Many PRSPs use nutrition profiles in their poverty analyses explicitly and/or implicitly.

The rhetoric on nutrition as a development problem is most often followed-up with proposed nutrition strategies and actions. However, there appears to be little prioritization, or sequencing of proposed actions. Furthermore, the tendency to list an exhaustive number or overwhelming array of activities, irrespective of the country's capacity, is counterproductive. Proposals are best translated into actions when activities are prioritized and supported by clear institutional analyses, capacity development plans, and, of course, financial resources. This is especially critical given that weak institutional capacity has been identified in many countries as a major obstacle to implementing nutrition actions.

Most importantly, the strategies and actions included in PRSPs often do not reflect an appropriate response to the nature of the nutrition problem in the country. A quarter of the countries with macronutrient deficiencies do not discuss any direct nutrition programs to address these. About 40% of countries with micronutrient deficiencies fail to mention any activities in their PRSPs to combat them. Also, even though in many countries food insecurity is rarely the only or even the major contributor to malnutrition, 90% of the PRSPs include activities related to food security. Furthermore, 33% of the PRSPs propose school feeding, even though most irreversible undernutrition happens before two years of age. Such misalignment between the causes of and responses to the nutrition problem will lead to a lack of impact and a waste of resources, which will further contribute to the marginalization of nutrition in the future.

Most countries include nutrition indicators as PRSP targets and/or progress monitoring indicators, and the review suggests that when information on nutrition trends is more readily accessible, nutrition stands a greater chance of inclusion. There seems to be a steep drop-off between good intentions and actual plans and budget allocations necessary for implementing the good intentions.

Box 4. Five Steps Towards Including Nutrition in Country PRSPs:^a

Step 1: Determine if country X has a nutrition problem of public health significance (See Figure 1 or Annex 1 for list of countries):

- If yes, there is a very strong rationale for including nutrition issues in the PRSP
- If not, you may wish to prioritize other sectors and see if/how nutrition issues fit in

Step 2: If you decide that nutrition issues are important:

- Review the size and nature of the nutrition problem (See Annex 1 for basic info.)
- Using levels of malnutrition estimated in Annex 1, calculate estimated productivity losses attributable to malnutrition (both under-nutrition and overweight), and cost-benefit analysis of addressing malnutrition¹⁵

Step 3: Identify the (possible) causes of malnutrition in country X:

- This information may be available in-country; if not:
- Commission some analytical work on this—DHS data are usually a good source for these analyses; also check for other data sets such as MICS, LSMS, etc^b

Step 4: Set up working groups to:

- Identify appropriate objectives for nutrition in country X^b
- Select strategies/actions that will respond to the size and nature of the nutrition problem^b
- Prioritize proposed actions so they match the epidemiology of the problem and the country capacity
- Lay out appropriate institutional arrangements for supporting the implementation of nutrition activities across sectors^b
- Plan the M&E and make necessary arrangements^b

Step 5: Allocate reasonable resources for action and resource these through subsequent PRSCs

- Support implementation
- Strengthen implementation through a learning-by-doing approach

Note:

^a Bank country teams need to play a major role in supporting countries to address nutrition problems effectively by preparing relevant ESW in advance and upgrading country capacity to tackle malnutrition in subsequent PRSC. Also, country teams can provide technical expertise to countries while advancing their M&E arrangement and impact evaluation of the country scheme.

^b Many of these steps can be built into the PRSP implementation process; however, if this is the arrangement, that should be made clear in the PRSP.

¹⁵ Existing simulation programs like PROFILES (www.aedprofile.org) may be used where appropriate

References

- Alderman H, Hoddinott J, and Kinsey B (2003). *Long-term consequences of early childhood malnutrition*. FCND discussion paper No. 168. IFPRI, Washington. <http://www.ifpri.org/divs/fcnd/dp/papers/fcndp168.pdf>
- Behrman JR, Alderman H, and Hoddinott J (2004). *Copenhagen Consensus—challenges and opportunities: Hunger and malnutrition*. 19 Feb 2004. http://www.copenhagenconsensus.com/Files/Filer/CC/Papers/Hunger and Malnutrition_070504.pdf
- Bhagwati JN, Fogel RW, Frey BS, Lin JY, North DC, Schelling TC, Smith VL, and Stokey NL (2004). Expert panel ranking. In: *Global crises, global solutions* (Ed: Lomborg B). Cambridge University Press, Cambridge, UK
- De Haan A (2002). *Nutrition in poverty reduction strategy papers: what role for “social issues” in the new aid architecture?* Background paper for the 5th report on World Nutrition Situation.
- DFID Health Systems Resource Centre (2003). *A review of the human resource content of PRSP and HIPC documentation in 6 selected African Countries*. DFID HSRC, London.
- Food and Agriculture Organization (2003). *Focus on food insecurity and vulnerability. A review of the UN system common country assessments and World Bank poverty reduction strategy papers*. FAO, Rome.
- Haddad L and Bouis H (1991). The impact of nutritional status on agricultural productivity: Wage evidence from the Philippines. *Oxford Bulletin of Economics and Statistics* 53 (1): 45-68.
- Hewitt A and Gillson I (2003). *A review of the trade and poverty content in PRSPs and loan-related documents*. Overseas Development Institute. London. http://www.odi.org.uk/publications/programme_papers/trade_prsps.pdf
- Horton S (1999). Opportunities for investment in nutrition in low-income Asia. *Asian Development Review*. 17:246-273.
- Horton S and Ross J (2003). The economics of iron deficiency. *Food policy*. 28: 51-75.
- IMF and World bank (2002). *IMF/World Bank comprehensive review of the poverty reduction strategy papers (PRSP) approach*. IMF/World Bank, Washington D.C. <http://www.imf.org/external/np/prspgen/review/2001/>.
- OED (2004). *The poverty reduction strategy initiative: an independent evaluation of the World Bank’s support through 2003*. World Bank, Washington, D.C.
- Schmidt MB (2002). *Review of the integration of social funds with poverty reduction strategy papers and country assistance strategies*. World Bank. Washington, D.C.
- Standing Committee on Nutrition (SCN) (2004). *5th report on the world nutrition situation: nutrition for improved development outcomes*. WHO, Geneva.
- Van Holst Pellekaan J (2001). *Food policy in poverty reduction strategy papers: some suggestions for national PRSP teams*. Presentation at a seminar on Hunger, Malnutrition and the PRSP on May 30, 2001 at the World Bank. Washington, D.C.

- Williams and Duncan (2001). *Food security and PRSPs: a rapid assessment of poverty reduction strategy papers and their relevance to food security problems*. Draft. Oxford Policy Management
- World Bank (2003a). *World Development Report 2004: making services work for poor people*. World Bank, Washington D.C.
- World Bank (2003b). *Poverty reduction strategy papers: do they matter for children and orphans affected by HIV/AIDS?* Preliminary report. Oct 27, 2003. World Bank, Washington D.C.
- World Bank (2004). *The millennium development goals for health: rising to the challenges*. World Bank Washington D.C.
- World Health Organization (1995). *Physical status: the use and interpretation of anthropometry. Report of a WHO Expert Committee*. WHO Technical Report Series 845. WHO, Geneva.
- World Health Organization (2000). *The management of nutrition in major emergencies*, WHO, Geneva.
- World Health Organization (2002). *Poverty reduction strategy papers: their significance for health*. WHO, Geneva.
- World Health Organization (2004). *Poverty reduction strategy papers: their significance for health: second synthesis report*. WHO, Geneva.

Annex 1. Nutrition Profiles of Countries with Full PRSPs

Country	Full PRSP completed in	U5MR	LBW	Wasting	Stunting	Under weight	Over weight	TGR	VAD	IDA in children <5y	IDA in women	ARC ^a of Stunting	ARC ^a of under weight
AFR													
Benin	Mar-03	151	16	7.5	30.7	22.9	1.3	<5	70	82	65	4.1	-4.9
Burkina Faso	Jun-00	207	19	13.2	36.8	34.3	1.6	29	46	83	48	1.7	0.8
Cameroon	Jul-03	166	11	5.9	29.3	22.2	2.9	12	36	58	32	1.7	5.5
Chad	Nov-03	200	17	11.2	29.1	28.0	-	24	45	76	56	-10.7	-10.9
Ethiopia	Sep-02	171	15	10.5	51.5	47.2	-	23	30	85	58	-2.8	0.3
Gambia	Jul-02	126	17	8.2	19.1	17.1	-	20	64	75	53	-11.4	-10.7
Ghana	May-03	97	11	9.5	25.9	24.9	1.9	18	60	65	40	0.0	-1.8
Guinea	Jul-02	165	12	9.1	41.0	33.0	-	23	40	73	43	4.1	3.4
Kenya	May-04	122	11	6.1	33.0	22.1	3.5	10	70	60	43	-0.3	-0.8
Madagascar	Nov-03	135	14	7.4	48.6	33.1	1.0	6	42	73	42	-0.8	-2.3
Malawi	Aug-02	182	16	5.5	49.0	25.4	6.7	22	59	80	27	0.0	-1.3
Mali	Mar-03	222	23	10.6	38.2	33.2	1.3	42	47	77	47	-4.8	4.2
Mauritania	Feb-01	183	42	12.8	34.5	31.8	-	21	17	74	42	-5.0	-4.0
Mozambique	Sep-01	205	14	7.9	35.9	26.1	-	17	26	80	54	-21.3	-1.7
Niger	Feb-02	264	17	13.6	39.7	40.1	1.1	20	41	57	47	0.2	0.0
Rwanda	Aug-02	203	9	6.8	42.6	24.3	2.1	13	39	69	43	-1.7	-2.4
Senegal	Dec-02	138	18	8.4	25.4	22.7	2.6	23	61	71	43	-1.2	0.5
Tanzania	Nov-00	165	13	5.4	43.8	29.4	2.5	16	37	65	45	0.2	0.3
Uganda	May-00	141	12	4.1	39.1	22.8	2.8	9	66	64	30	0.3	-1.9
Zambia	May-02	182	10	5.0	46.8	28.1	3.3	25	66	63	46	1.6	1.8
EAP													
Cambodia	Feb-03	138	11	15.0	44.6	45.2	-	18	42	63	58	-4.5	-1.2
Lao	Nov-04	100	14	15.4	40.7	40.0	-	14	42	54	48	-2.4	-0.9
Mongolia	Sep-03	71	8	3.6	24.6	12.7	3.9	15	29	37	18	-1.0	0.3
Vietnam	Jul-02	26	9	8.6	36.5	33.8	0.7	11	12	39	33	-4.5	-2.9
ECA													
Albania	Jun-02	24	3	11.1	31.7	14.3	-	-	-	-	-	9.7	28.4
Armenia	Nov-03	35	7	1.9	12.9	2.6	6.3	12	12	24	12	1.7	-7.5
Azerbaijan	May-03	96	11	8.0	19.6	16.8	3.7	15	23	33	35	-3.1	12.7
Bosnia-Herzegovina*	Jun-04	18	4	6.3	9.7	4.1	-	-	-	-	-		
Georgia	Nov-03	29	6	2.3	11.7	3.1	-	21	11	33	31		
Krygyz Rep.	Feb-03	61	7	3.4	24.8	5.8	-	21	18	42	31		-16.0
Moldova*	Nov-04	32	5	-	-	-	-	-	-	-	-		
Serbia & Montenegro*	Mar-04	19	4	-	5.1	1.9	-	-	-	-	-	-7.2	4.3
Tajikistan	Dec-02	116	15	4.9	30.9	-	-	28	18	45	42	0.0	
LAC													
Bolivia	Jun-01	71	9	1.3	26.8	7.6	6.5	<5	23	59	30	0.0	-5.3
Guyana	Sep-02	72	12	11.4	10.0	11.8	2.3	-	-	-	-		-4.6
Honduras	Oct-01	42	14	1.1	29.2	16.6	1.4	12	15	34	31	-2.9	-0.8
Nicaragua	Sep-01	41	13	2.0	20.2	9.6	2.8	4	9	47	40	-1.0	-1.3
MNA													
Djibouti	Jun-04	143	-	12.9	25.7	18.2	-	-	-	-	-		
Yemen	Aug-02	114	32	12.9	51.7	46.1	4.3	16	40	59	49	2.4	6.1
SAR													
Bhutan	Dec-04	94	15	2.6	40.0	18.7	2.0	-	32	81	55	-	-

Country	Full PRSP completed in	U5MR	LBW	Wasting	Stunting	Under weight	Over weight	TGR	VAD	IDA in children <5y	IDA in women	ARC ^a of Stunting	ARC ^a of under weight
Nepal	Nov-03	83	21	9.6	50.5	48.3	0.5	24	33	65	62	-1.6	0.1
Pakistan	Mar-04	101	19	14.2	36.3	38.2	3.1	38	35	56	59	-10.4	-0.5
Sri Lanka	Apr-03	19	22	13.3	20.4	32.9	0.1	-	-	-	-	-7.7	-1.5

^a ARC: Annual rate of change is based on data available between 1990 and 2003. Three countries with * are not included in the review as the prevalence of undernutrition is lower than public health significance defined by WHO.



HEALTH, NUTRITION,
AND POPULATION



HUMAN DEVELOPMENT NETWORK

THE WORLD BANK

About this series...

This series is produced by the Health, Nutrition, and Population Family (HNP) of the World Bank's Human Development Network. The papers in this series aim to provide a vehicle for publishing preliminary and unpolished results on HNP topics to encourage discussion and debate. The findings, interpretations, and conclusions expressed in this paper are entirely those of the author(s) and should not be attributed in any manner to the World Bank, to its affiliated organizations or to members of its Board of Executive Directors or the countries they represent. Citation and the use of material presented in this series should take into account this provisional character. For free copies of papers in this series please contact the individual authors whose name appears on the paper.

Enquiries about the series and submissions should be made directly to the Managing Editor Nicole Klingen (Nklingen@worldbank.org) or HNP Advisory Service (healthpop@worldbank.org, tel 202 473-2256, fax 202 522-3234). For more information, see also www.worldbank.org/hnppublications.



THE WORLD BANK

1818 H Street, NW
Washington, DC USA 20433
Telephone: 202 473 1000
Facsimile: 202 477 6391
Internet: www.worldbank.org
E-mail: feedback@worldbank.org