Guide to the Millennium Development Goals **Employment Indicators**



Second edition



Guide to the Millennium Development Goals Employment Indicators

Second edition

Copyright © International Labour Organization 2013

First published 2013

Publications of the International Labour Office enjoy copyright under Protocol 2 of the Universal Copyright Convention. Nevertheless, short excerpts from them may be reproduced without authorization, on condition that the source is indicated. For rights of reproduction or translation, application should be made to ILO Publications (Rights and Permissions), International Labour Office, CH-1211 Geneva 22, Switzerland, or by email: pubdroit@ilo.org. The International Labour Office welcomes such applications.

Libraries, institutions and other users registered with reproduction rights organizations may make copies in accordance with the licences issued to them for this purpose. Visit www.ifrro.org to find the reproduction rights organization in your country.

Guide to the millennium development goals employment indicators International Labour Office, Employment Sector. – Geneva: ILO, 2013

ISBN 978-92-2-127358-5 (web PDF)

International Labour Office; Employment Sector

employment / decent work / economic indicator / definition / data collecting / methodology / developed countries / developing countries 13.01.3

ILO Cataloguing in Publication Data

The designations employed in ILO publications, which are in conformity with United Nations practice, and the presentation of material therein do not imply the expression of any opinion whatsoever on the part of the International Labour Office concerning the legal status of any country, area or territory or of its authorities, or concerning the delimitation of its frontiers.

The responsibility for opinions expressed in signed articles, studies and other contributions rests solely with their authors, and publication does not constitute an endorsement by the International Labour Office of the opinions expressed in them.

Reference to names of firms and commercial products and processes does not imply their endorsement by the International Labour Office, and any failure to mention a particular firm, commercial product or process is not a sign of disapproval.

ILO publications and electronic products can be obtained through major booksellers or ILO local offices in many countries, or direct from ILO Publications, International Labour Office, CH-1211 Geneva 22, Switzerland. Catalogues or lists of new publications are available free of charge from the above address, or by email: pubvente@ilo.org. Visit our website: www.ilo.org/publns

This publication was produced by the Document and Publications Production, Printing and Distribution Branch (PRODOC) of the ILO.

Graphic and typographic design, layout and composition, electronic publishing and distribution.

PRODOC endeavours to use paper sourced from forests managed in an environmentally sustainable and socially responsible manner.

Code: COC-WEI-IMPR

Preface

The primary goal of the ILO (International Labour Organization) is to contribute, with member States, to achieve full and productive employment and decent work for all, including for women and young people, a goal embedded in the ILO 2008 Declaration on *Social Justice for a Fair Globalization*, and which has now been widely adopted by the international community.

In order to support member States and the social partners to reach the goal, the ILO pursues a Decent Work Agenda (DWA) which comprises four interrelated areas: respect for fundamental workers' rights and international labour standards, employment promotion, social protection and social dialogue. Explanations of this integrated approach and related challenges are contained in a number of key documents and tools which elaborate the concept of decent work and its mainstreaming,² as well as in the Employment Policy Convention, 1964 (No. 122), and in the Global Employment Agenda (GEA).

The Global Employment Agenda adoption in 2003 constitutes the basic policy framework through which the ILO pursues the objective of placing employment at the centre of economic and social policies.³ As the lead United Nations (UN) agency promoting productive employment and decent work, the ILO has an important responsibility for ensuring that the Millennium Development Goals (MDGs) employment indicators are well understood and utilised by countries. This *Guide* contributes to delivering on this responsibility.

This Guide to the Millennium Development Goals Employment Indicators has been produced as a tool for country level use. It provides definitions, concepts and formulas for each of the new employment indicators, and is part of ILO's wider support to strengthening national level labour market information and analysis to inform policy making. Your views on its usefulness and applicability are most welcomed.

José Manuel SALAZAR-XIRINACHS
Executive Director
Employment Sector
ILO Geneva

^{1.} See http://www.ilo.org/public/english/bureau/dgo/download/dg_announce_en.pdf

^{2.} See the successive Reports of the Director-General to the International Labour Conference: Decent work (1999); Reducing the decent work deficit: A global challenge (2001); Working out of poverty (2003). See also the Toolkit for Mainstreaming Employment and Decent Work, Country Level Application, United Nations System Chief Executives Board for Coordination, ILO, 2008, http://www.ilo.org/public/english/bureau/pardev/download/toolkit_country_en.pdf

^{3.} See http://www.ilo.org/gea. And in particular: Implementing the Global Employment Agenda: Employment strategies in support of decent work, "Vision" document, ILO, 2006.



Acknowledgements

This *Guide* is the result of a collaborative effort within the International Labour Organization, and most especially among units within the Employment Sector. Specifically it benefitted from technical inputs from the Country Employment Policy Unit, headed by Alana Albee at the time of the first edition the *Guide*, and the Employment Trends Unit, previously headed by Lawrence Jeff Johnson. The publication would not have been possible without substantial contributions from Theo Sparreboom, Sara Elder, Dorothea Schmidt, Eléonore D'Achon, Steven Kapsos, Valentina Stoevska and Monica Castillo.

The *Guide* also benefited greatly from comments and suggestions made by Laura Brewer in the Skills Department. Supplementary information was provided by the ILO's Statistics Department including the full Decent Work Indicator set and technical information on the "share of women in wage employment in the non-agricultural sector".

Finally, we wish to thank those who supported the publication of the first edition of the *Guide* into four languages, and its dissemination. They include Miranda Kwong, Roland Müller, Julia Lee, Francisco Dos Santos Guerreiro, Joel Cathenod, Maria Rodrigo Stinus and Stéphanie Garde.



Contents

Preface	iii
Acknowledgements	v
List of abbreviations	ix
PART A	
1. Background	1
2. MDG 1B target and indicators	3
3. Strengthening monitoring of labour markets	4
4. Background to the information sheets	5
PART B	
1. Information sheets for employment indicators	7
2. Country example: Pakistan	27
3. Decent Work Indicators (full proposed set)	32
4. Useful contacts	36



List of abbreviations

CPI Consumer Price Index
DWA Decent Work Agenda

DWCP Decent Work Country Programme

DWI Decent Work Indicator

FBS Federal Bureau of Statistics

GDP Gross Domestic Product

GEA Global Employment Agenda

GET Global Employment Trends

HIV/AIDS Human Immuno-deficiency Virus/

Acquired Immune Deficiency Syndrome

IAEG Inter-Agency and Expert Group

ICLS International Conference of Labour Statisticians
ICSE International Classification by Status in Employment

ILO International Labour Organization
IMF International Monetary Fund

ISCO International Standard Classification of Occupations
ISIC International Standard Industrial Classification

of all Economic Activities

KILM Key Indicators of the Labour Market
LABORSTA International Labour Office Database

on Labour Statistics

LMIAS Labour Market Information and Analysis System

MDG Millennium Development Goals
MICS Multiple Indicator Cluster Survey

OECD Organisation for Economic Co-operation

and Development

PPP Purchasing Power Parity
SNA System of National Accounts

UN United Nations

UNDESA United Nations Department of Economic

and Social Affairs



Part A 1. Background

In 2000, the largest-ever gathering of world leaders ushered in the new millennium by adopting the Millennium Declaration, endorsed by 189 countries. It was then translated into a roadmap setting out goals to be reached by 2015.

The eight Millennium Development Goals, see box below, build on agreements made by all countries at the United Nations in the 1990s to reduce poverty and hunger, and to tackle ill-health, gender inequality, lack of education, lack of access to clean water and environmental degradation.

The MDGs are a compact, which recognizes the efforts that must be undertaken by developing countries, the contribution that developed countries can make as well as the importance of all countries working in partnership for the betterment of all, in particular the most vulnerable.

In February 2007, the Secretary-General of the United Nations began a two-year devoted effort in the Commission for Social Development to actions which "promote full employment and decent work for all." Resolutions adopted guided the work of the Inter-Agency and Expert Group (IAEG) in their efforts to expand the MDGs to include a new target for employment and four new employment indicators. The indicators (detailed in this Guide) call on all countries to report progress and provide disaggregate data by sex and urban/rural as far as possible.

The aim of this Guide is to inform national and international stakeholders on the definitions, concepts, calculations and data sources for each of the employment indicators introduced in 2008 under the MDGs (see next page). It also reinforces the previously established indicator on gender equality in the labour market under Goal 3. The purpose is to assist countries to monitor and report effectively on their

Millennium Development Goals

- 1. Eradicate extreme poverty and hunger
- 2. Achieve universal primary education
- 3. Promote gender equality and empower women
- 4. Reduce child mortality
- 5. Improve maternal health
- 6. Combat HIV/AIDS, malaria and other diseases
- 7. Ensure environmental sustainability
- 8. Develop a global partnership for development

employment situation. It should be recognized that the four employment indicators are a first step towards monitoring the employment-dimension of the Decent Work Agenda. The 2008 ILO Declaration on Social Justice for a Fair Globalization endorses Decent Work Agenda and its four essential pillars:

- (i) International labour standards and fundamental principles and rights at work
- (ii) Employment creation
- (iii) Social Protection
- (iv) Social Dialogue and tripartism

The Declaration recommends that ILO Members may consider "the establishment of appropriate indicators or statistics, if necessary with the assistance of the ILO, to monitor and evaluate the progress made toward decent work." Thus, the MDG employment indicators should be seen in the context of the full set of nearly

^{1.} See www.un.org/esa/socdev.

^{2.} See paragraph II.B.ii of the 2008 ILO Declaration on Social Justice for a Fair Globalization, http://www.ilo.org/public/english/bureau/dgo/download/dg_announce_en.pdf

90 Decent Work Indicators (DWIs) that cover the four strategic objectives of the Decent Work Agenda.

A conceptual framework for measuring decent work which covers the DWIs was defined in September 2008 in a Tripartite Meeting of Experts and subsequently presented to the ILO Governing Body and the 18th International Conference of Labour Statisticians (ICLS). (See Part B.3 for the full list of decent work indicators and see also the ILO Manual (First Version), Decent Work Indicators Concepts and Definitions which

provides guidelines on the full set of Decent Work Indicators).³

This Guide complements the ILO Manual (First Version), Decent Work Indicators Concepts and Definitions and is a supplement to the 2003 Indicators for Monitoring the Millennium Development Goals: definitions, rationale, concepts and sources. The basic information needed to monitor progress on each indicator is explained. For the complete MDG database please refer to http://mdgs.un.org.

A.2. MDG 1B target and indicators

Recognizing that decent and productive work for all is central to addressing poverty and hunger, MDG 1 included a new target and indicators (agreed upon in 2008):

New MDG Target (1B) -

Achieve full and productive employment and decent work for all, including women and young people

This target contains four indicators specifically and directly relating to employment issues. This Guide focuses on these four employment indicators:

Employment Indicators:

- Growth rate of labour productivity (GDP per person employed)
- Employment-to-population ratio
- Proportion of employed people living below the poverty line (working poverty rate)
- Proportion of own-account and contributing family workers in total employment (vulnerable employment rate)

These employment indicators are designed to:

- Provide relevant and robust measures of progress towards the new target of the Millennium Development Goals
- Be clear and straightforward to interpret and provide a basis for international comparison
- Be relevant and link to national-level country monitoring systems
- Be based on concepts and definitions defined as international statistical standards (for example, based on resolutions and guidelines of the ICLS) and best practice in labour statistics, information and analysis
- Be constructed from well-established data sources which enable consistent measurement over time

A.3. Strengthening monitoring of labour markets

4

The need to monitor employment trends internationally and at country level is not new, but it is more urgent than ever given the impact of economic crises that began in late 2008. The slowdown in economic growth in both developed and developing countries is cutting into government revenues and their abilities to invest in infrastructure, health and education. As economies slow, job losses and vulnerable employment increases and productivity declines. ILO reports show dramatic increases in unemployment, working poverty and vulnerable employment.¹

There is an urgent need, therefore, to have accurate and detailed data and information regularly produced on

employment, especially among the poorest segments of the population. Reliable statistics, information and analyses are required in order to develop and monitor policies. This not only concerns strong national statistical offices, but also requires collaboration between statistical agencies, government departments and social partners.

The economic crisis is just one of the reasons for strengthening labour market information and analysis. There is need in most countries to strengthen the analytical base for national development plans and priorities. By establishing a set of indicators on the labour market and monitoring them regularly, evidence-based policy decision making can be strengthened.

A.4. Background to the information sheets

The information sheets in Part B.1 (see next pages) provide practical guidance on data collection and analysis of each of the four employment indicators under MDG 1. In addition, an information sheet is included on the employment indicator under MDG 3 (Gender Equality). For each indicator, the following information is included:

- The link between the indicator and the MDG goal and target
- Description and method of computation
- Definitions
- Sources and data collection
- Rationale for use of the indicator
- Comments and limitations
- Links to global and regional monitoring

A practical example of the type of national analysis that can be produced based on the four MDG 1B indicators is provided in Part B.2.

The MDG employment indicators should be understood as a sub-set of the full set of nearly 90 ILO Decent Work Indicators listed in Part B.3. The full set can be adapted to national circumstances and used to monitor the national Decent Work Country Programme (DWCP), Poverty Reduction Strategy (PRS), and National Development Frameworks. It may also be useful for countries that are considering establishing a Labour Market Information and Analysis System (LMIAS).

Finally, Part B.4 includes references which may be useful for additional information.



Part B 1. Information sheets for employment indicators

Indicator 1.4 Growth rate of labour productivity (GDP per person employed)

Goal and target addressed

MDG Goal 1: Eradicate extreme poverty & hunger MDG Target 1B: Achieve full and productive employment and decent work for all, including women and young people

Indicator: description and method of computation

The labour productivity growth rate is measured as the annual change in Gross Domestic Product (GDP) per person employed.

$$Labour\ productivity = \frac{GDP\ (measured\ at\ constant\ market\ prices\ in\ national\ currency)}{total\ employment}$$

$$Labour\ productivity = \frac{labour\ productivity_{year\ N} - labour\ productivity_{year\ N-1}}{labour\ productivity_{year\ N-1}} \times 100$$

Definitions

Labour productivity represents the amount of output achieved per unit of labour input. For this purpose, output is measured as the national gross domestic product or GDP, a measure found in the national accounts of a country. According to the System of National Accounts (SNA), GDP derives from the concept of value added. Gross value added is the difference between output and intermediate consumption. GDP is the sum of gross value added of all resident producer units plus that part (possibly the total) of taxes on products, less subsidies on products, that is not included in the valuation of output. Next, GDP is also equal to the sum of the final uses of goods and services (all uses except intermediate consumption) measured at purchasers' prices, less the value of imports of goods and services. Finally, GDP is equals the sum of primary incomes distributed by resident producer units.¹

Labour input is measured as the number of persons employed, or total employment. *Employment* refers to people above a certain age who worked or held a job during a specified reference period (as defined in the Resolution concerning statistics of the economically active population,

^{1.} See *System of National Accounts 2008* (New York, 2009), available at: http://unstats.un.org/unsd/nationalaccount/docs/SNA2008.pdf

Sources and data collection

employment, unemployment and underemployment, adopted by the 13th International Conference of Labour Statisticians (ICLS), October 1982). Included are: persons who worked for pay or profit (or pay in kind), persons who were temporarily absent from a job for such reasons as illness, maternity or parental leave, holiday, training or industrial dispute, and unpaid family workers who work for at least one hour. The measure is intended to capture persons working in the formal and informal sectors and households.

Estimates of GDP at constant prices, which should be used for the measurement of labour productivity over time, refer to the volume level of GDP and are obtained by expressing values in terms of a base period. Guidelines for measurement of GDP are outlined in the United Nations System of National Accounts (UNSNA), 2008. See website: http://unstats.un.org/unsd/nationalaccount/docs/SNA2008.pdf

Employment data could be obtained from population censuses, labour force or other household surveys, establishment surveys, administrative records and official estimates based on results from several of these sources. Labour force surveys can be designed to cover virtually the entire population of a country, all branches of economic activity, all sectors of the economy, and all categories of workers, including own-account workers, unpaid family workers and persons engaged in the informal economy. For this reason, household-based labour force surveys offer a unique advantage for obtaining information on the labour market of a country and its structure. [See section in employment-to-population ratio, indicator 1.5 for more information.]

Disaggregation: For the purpose of this indicator, no disaggregation (for example, of specific economic sectors) is required. Disaggregations by economic sector can however provide additional insights.

Rationale

Labour productivity can be used to assess the likelihood of the country's economic environment to create and sustain decent employment opportunities with fair equitable remuneration. Growth in labour productivity can occur in a number of ways. There may be an increased efficiency in the use of labour, without using any more of the other inputs. Alternatively, the growth may be due to an increased use of other inputs such as physical capital or intermediate inputs. A third way in which growth in the total economy can occur is as a result of a shift in the mix of activities in the economy. For instance, an industry might have shifted from activities with low levels of productivity to activities with higher levels, even if none of the activities has become more productive.

 $^{2.} See http://www.ilo.org/global/statistics-and-databases/standards-and-guidelines/resolutions-adopted-by-international-conferences-of-labour-statisticians/WCMS_087481/lang--en/index.htm\\$

There is empirical evidence that the link between productivity growth and poverty reduction is highest when productivity growth and employment growth go hand in hand. Consequently, measuring both growth in employment (see employment-to-population ratio, indicator 1.5) and productivity is needed to assess whether the development process is heading in the right direction. In addition, productivity increases often influence the social and economic environment positively, in turn leading to poverty reduction through investment, sectoral shifts, trade, technological progress and increases in social protection.

Increases in productivity do not guarantee improvements in these areas, but it is certain that without productivity growth, improvements in conditions of work are less likely to occur. With limited increases in productivity, an economy generally sees little increase in the wages of workers and there is no additional potential to create new jobs. It is important that productivity growth is accompanied by improvements in the education and training systems so that the future workforce is better prepared to perform the jobs needed.

Comments and limitations

Differences in valuation concepts such as GDP at factor costs or GDP at market prices affect the consistency of the levels of output in national currency when compared across countries. But the valuation concept has little impact on comparisons of growth rates of productivity as the percentage differences between output at various valuation concepts do not change much over time.

Despite the common principles based on the United Nations System of National Accounts, there are still significant problems in international consistency of national accounts estimates, in particular for economies outside the Organization for Economic Co-operation and Development (OECD). One example of inconsistency arises from the different degree of coverage of informal economic activities in developing economies and of the underground economy in developed economies in national accounts. Some economies use data from special surveys for "unregistered activities", or indirect estimates from population censuses or other sources to estimate these activities, and large differences in coverage between economies remain. In addition to such inconsistencies there are significant differences in scope and quality of the primary national statistics and the staff resources available for the preparation of the relevant national estimates.

For more information on limitations to comparability, see chapter 7 of ILO, *Key Indicators of the Labour Market*, 7th Edition (Geneva, 2011); www.ilo.org/kilm.

Data for global and regional monitoring

Data for global and regional monitoring for this indicator is reported by the International Labour Organization, Employment Trends Unit, Geneva, Switzerland.

Rather than collect national estimates on labour productivity, the ILO produces estimates of labour productivity based on international sources of GDP and ILO estimates of employment. [See section on the

employment-to-population ratio, indicator 1.5, for more information on ILO estimates of employment.] GDP estimates are those extracted from the World Bank's World Development Indicators and the IMF's World Economic Outlook database. Documentation about these sources is available at at: http://data.worldbank.org/data-catalog/world-development-indicators and http://www.imf.org/external/pubs/ft/weo/2011/02/weodata/index.aspx

Sources of discrepancies between reported MDG indicators and national indicators: To compare labour productivity levels across economies, it is necessary to convert GDP expressed in national currency to GDP expressed in US dollars adjusted by purchasing power parity (PPP). A PPP represents the amount of a country's currency that is required to purchase a standard set of goods and services worth one US dollar. The use of PPPs, as well as discrepancies between nationally-reported and ILO estimates of employment, may result in productivity levels and growth rates that differ from those reported by national institutions.

Indicator 1.5. Employment-to-population ratio

Goal and target addressed

MDG Goal 1: Eradicate extreme poverty & hunger MDG Target 1B: Achieve full and productive employment and decent work for all, including women and young people

Indicator: description and method of computation

The employment-to-population ratio is the proportion of a country's working-age population that is employed. The indicator is computed by dividing the total number of employed person above a certain age (typically 15 years and over) by the population of the same age group:

$$Employment-to-population \ ratio = \frac{total \ employment}{working-age \ population} \times 100$$

The indicator typically falls between 50 and 75 per cent with a higher share indicating that a greater proportion of the population that could be working does work. A low ratio indicates that a large share of the population is not involved in production of economic goods and services. In most countries, the ratio is lower for females than for males.

Definitions

Employment refers to people above a certain age who worked or held a job during a specified reference period (as defined in the Resolution concerning statistics of the economically active population, employment, unemployment and underemployment, adopted by the 13th International Conference of Labour Statisticians, October 1982). Included are: persons

who worked for pay or profit (or pay in kind), persons who were temporarily absent from a job for such reasons as illness, maternity or parental leave, holiday, training or industrial dispute, and unpaid family workers who work for at least one hour. The measure is intended to capture persons working in the formal and informal sectors and households.

The working age population is the population above a specified minimum age and below a specified maximum age, prescribed for the measurement of economic characteristics. For most countries, the working-age population is defined as persons aged 15 years and older, although this may vary slightly from country to country.

Sources and data collection

Data could be obtained from population censuses, labour force or other household surveys, establishment surveys, administrative records and official estimates based on results from several of these sources. *Both components (employment and population) should come from the same source.*

Labour force surveys can be designed to cover virtually the entire population of a country, all branches of economic activity, all sectors of the economy, and all categories of workers, including own-account workers, unpaid family workers and persons engaged in the informal economy. For this reason, household-based labour force surveys offer a unique advantage for obtaining information on the labour market of a country and its structure.

Other sources such as population censuses, administrative records, etc. differ in scope, coverage, units of measurement and methods of data collection.

For the purposes of international comparisons, the ILO sets the lower age limit at 15 years. For many countries, this age corresponds directly to societal standards for education and work eligibility. Some countries impose an upper limit for eligibility, such as 65 or 70 years, although if possible, all upper age groups should be included.

Disaggregation: Ideally, the data should be disaggregated by sex and age group. Countries might also want to consider disaggregating according to urban/rural residence and/or educational attainment.

Rationale

The indicator provides information on the ability of an economy to provide employment. The ratio, both in its level and change over time, can be viewed in connection with economic growth to determine the extent to which economic growth is pro-employment.

Reviewing the indicator by sex (male v female) and age (youth v total) also provides a picture of the equality of employment opportunities across different population groups.

Comments and limitations

The employment-to-population ratio indicator measures the proportion of the working-age population that is in employment and as such provides quantitative information only. It says nothing concerning the quality of employment and this poses a dilemma in terms of prescribing a positive direction for the indicator's trends over time. An increase in the indicator, meaning a larger share of the country's population has gained employment, has positive implications on poverty reduction only if the jobs gained are well-paid, productive and secure – in other words, if the jobs gained are decent jobs. Reviewing this indicator along with other indicators for MDG target 1B will provide a broader picture of the direction and quality of employment growth.

There is no optimal employment-to-population ratio. Developed economies tend to have lower ratios than developing economies because their higher productivity and incomes means that fewer workers are required to meet the needs of the entire population. Very high ratios, on the other hand, indicate that the majority of poor people are working out of the necessity to subsist regardless of the quality of work.

The following summarizes some general "rules" relating to the indicator trends:

- Ratios should be lower for youth than for the overall population (15 years and over) as more young people (as a share of their age group) participate in education in comparison with adults. Unless the young person is working as a principal activity while studying, they will be counted as outside of the labour force (meaning they are not counted among the numerator – youth employed – but remain in the denominator – youth population).
- Ratios for women may be lower than those for men as a result of
 women voluntarily staying at home and not participating in labour
 markets. However, if the difference is the result of involuntarily low
 labour force participation for women, efforts should be made to increase the ratios for females over time by promoting employment opportunities for women.
- Employment-to-population ratios should neither be too low nor too high. Ratios above 75 per cent, for instance, often occur in very poor countries and usually indicate an abundance of low quality jobs.
- Sharp increases in employment-to-population ratios should be analysed carefully, in particular in relation with changes in productivity.

Data for global and regional monitoring

Data for global and regional monitoring for this indicator is reported by the International Labour Organization, Employment Trends Unit, Geneva, Switzerland.

The majority of ILO data for the employment-to-population ratios reflect nationally-reported data collected by the ILO Department of Statistics or other international organizations such as the Organisation for Economic Co-operation and Development. The full dataset of available country-level employment-to-population ratios is reported in table 2b in the Key Indicators of the Labour Market (KILM) dataset (www.ilo. org/kilm).

However, because not all countries report data in every year and, indeed, some countries do not report data for any year, the ILO has developed an econometric model to estimate missing values and generate global and regional estimates. Both the model-based country-level estimates (reported as KILM table 2a) and the nationally reported ratios (KILM table 2b) are passed on to the UN for publication under indicator 1.5.

Sources of discrepancies between reported MDG indicators and national indicators: The model-based country-level estimates, which are produced in order to harmonize and standardise data and complete the series for every country and every year, might be found to differ slightly from the nationally reported ratios. The reason for the discrepancy is related to the technique and assumptions made in the model, as described below.

The ILO Trends Econometric Models use multivariate regression techniques to impute missing values at the country level. The first step in each model is to assemble every known piece of real information (i.e. every real data point) for each indicator in question. It is important to note that only data that are national in coverage and comparable across countries and over time are used as inputs. This is an important selection criterion when the models are run, because they are designed to use the relationship between the various labour market indicators and their macroeconomic correlates (such as per-capita GDP, GDP growth rates, demographic trends, geographic indicators and country and time dummy variables) in order to produce estimates of the labour market indicators where no data exist. Thus, the comparability of the labour market data that are used as inputs in the imputation models is essential to ensure that the models accurately capture the relationship between the labour market indicators and the macroeconomic variables.

For further information on the world and regional econometric models, readers can consult the technical background papers available at the following website: www.ilo.org/public/english/employment/strat/wrest.htm.

Goal and target addressed

MDG Goal 1: Eradicate extreme poverty & hunger MDG Target 1B: Achieve full and productive employment and decent work for all, including women and young people

14

Indicator: description and method of computation

The working poor are defined as employed persons living in a house-hold whose members are estimated to be below the nationally-defined poverty line.

The number of working poor is calculated on the basis of cross-tabulations from household survey data sets that include variables on both poverty status and labour force characteristics. An individual is classified as working poor if he or she is 1) employed and 2) living in a household with per-capita consumption or income that is below the poverty line.

Age 15 years and over is typically used to define the standard working-age population of a country. Some countries, however, apply other age limits. It is the nationally-defined working-age population which should be used here.

The working poverty rate is the proportion of working poor in total employment:

 $Working poverty rate = \frac{\begin{array}{c} \text{number of employed persons living in} \\ \text{a household with per-capita consumption} \\ \text{or income below the poverty line} \\ \text{total employment} \end{array}} \times 100$

Definitions

Working poor and working poverty rate - see definitions under "Description" above.

Employment refers to people above a certain age who worked or held a job during a specified reference period (as defined in the Resolution concerning statistics of the economically active population, employment, unemployment and underemployment, adopted by the 13th International Conference of Labour Statisticians, October 1982). Included are: persons who worked for pay or profit (or pay in kind), persons who were temporarily absent from a job for such reasons as illness, maternity or parental leave, holiday, training or industrial dispute, and unpaid family workers who work for at least one hour. The measure is intended to capture persons working in the formal and informal sectors and households.

The *poverty line* is the minimum level of consumption or income deemed necessary to achieve an adequate standard of living in a given country. *National poverty lines* are thresholds defined at the country level, below which a person is deemed to be poor. For international comparisons, a poverty line of \$1.25 a day measured at 2005 international dollars (adjusted for PPP) is used.

Sources and data collection

To estimate the number and proportion of the working poor, it is first necessary to establish the poverty line. Different countries use different methods for doing this. Information on household consumption expenditure is obtained through surveys on household consumption expenditure or, in some cases, household income. Household consumption data is usually preferred, since it tends to be more reliable, and also because it tends to give a better reflection of the real current living standards of households. A level of household consumption expenditure (or income) is then set below which the person or household is considered to be poor. This threshold level is set at the amount of net income (and therefore expenditure) necessary to buy a specified quantity of household goods.

As this indicator requires a cross-tabulation of employment status and poverty status on the basis of household survey data, both sets of information must be derived from the same source, typically household income/expenditure surveys or living standards surveys. However, as these surveys often do not have probing questions related to employment as in a typical labour force survey, the employment data derived in the cross-tabulation should be compared with other survey- or census-based estimates of employment to identify potential biases in the estimates. If large differences are observed, working poverty rates derived from an income/expenditure survey can be applied to employment estimates from a labour force survey to obtain an estimate of the total number of working poor in a country.

The labour market information (total employment) could be obtained from population censuses, labour force or other household surveys, establishment surveys, administrative records and official estimates based on results from several of these sources. Labour force surveys can be designed to cover virtually the entire population of a country, all branches of economic activity, all sectors of the economy, and all categories of workers, including own-account workers, unpaid family workers and persons engaged in casual work or marginal economic activity. For this reason, household-based labour force surveys offer a unique advantage for obtaining information on the labour market of a country and its structure. (See section in employment-to-population ratio, indicator 1.5 for more information).

Disaggregation: For the purpose of this indicator, disaggregation is recommended, as estimates disaggregated by age, sex, economic sector, status in employment and level of education are often very useful in identifying key characteristics of the working poor.

Rationale

Working poverty gives an indication of the lack of decent work: if a person's work does not provide an income high enough to lift them and their families out of poverty, then these jobs, at the very least, do not fulfil the income component of decent work and it is likely that other components are not being fulfilled either. Within the development process, the working poor share would decrease, which would, in turn, further foster the development process.

The working poor definition shows the intersection of poverty status and employment status. By combining labour market information with poverty data, working poverty estimates clarify the relationship between poverty and employment and thereby complement standard poverty data.

Comments and limitations

Where the methodology used in the poverty surveys in a particular country changes over time, it is extremely difficult to make useful comparisons over time. However, where the same poverty line is used consistently over time and the same survey methodology has been used for collecting the income and expenditure data, it should be possible to make valid comparisons over time.

Even if these conditions are met, poverty rates may vary quite substantially from year to year because of economic or weather conditions. Natural disasters (such as the Asian tsunami) or financial crises (such as the 1997 financial crash in South East Asia) can have a major effect on poverty rates, at least in the short term.

One other major problem is the way in which non-market production and consumption are valued. In some countries these may represent an important part of income and consumption, and decisions made about the value to be attached to these items will have an important effect on the poverty rates.

Data for global and regional monitoring Data for global and regional monitoring for this indicator is reported by the International Labour Organization, Employment Trends Unit, Geneva, Switzerland.

The ILO publishes country-level working poverty estimates on the basis of national income/expenditure surveys in the Key Indicators of the Labour Market publication. The working poverty estimates published in the KILM correspond to the international US\$1.25 and US\$2 a day poverty lines. The ILO also produces global and regional estimates of the working poor based on Trends Econometric Models that utilize available national data and applies multivariate regression techniques to impute missing values at the country level. The first step in each model is to assemble every known piece of real information (i.e. every real data point) for each indicator in question. It is important to note that only data that are national in coverage and comparable across countries and over time are used as inputs. This is an important selection criterion when the models are run, because they are designed to use the relationship between the various labour market indicators and their macroeconomic correlates (such as percapita GDP, GDP growth rates, demographic trends, geographic indicators and country and time dummy variables) in order to produce estimates of the labour market indicators where no data exist. Thus, the comparability of the labour market data that are used as inputs in the imputation models is essential to ensure that the models accurately capture the relationship between the labour market indicators and the macroeconomic variables.

For the ILO calculation of working poor, information on household whose per capita income/expenditure is below the international poverty

line at US\$1.25 a day come from the World Bank (reproduced as MDG indicator 1.1). The resulting measure of working poor, therefore, refers to employed persons who live with their families below the US\$1.25/day poverty line.

Sources of discrepancies between reported MDG indicators and national indicators: Because some country-level estimates shown by the UN within the MDG indicators are model-based estimates, produced in order that harmonized data can be provided for every country and every year, the indicator produced from sources at the national level might be found to differ.

Indicator 1.7 Proportion of own-account and contributing family workers in total employment (vulnerable employment rate)

Goal and target addressed

MDG Goal 1: Eradicate extreme poverty & hunger MDG Target 1B: Achieve full and productive employment and decent work for all, including women and young people

Indicator: description and method of computation

The indicator is a measure of what are deemed to be the more vulnerable statuses of employment, namely own-account workers and contributing family workers.

The vulnerable employment rate is calculated as the sum of own-account and contributing family workers as a proportion of total employment:

(number of own-account workers +

Vulnerable employment rate = $\frac{\text{number of contributing family workers})}{\text{total employment}} \times 100$

Definitions

The indicator is based on the measure of status in employment, as defined according to the International Classification by Status in Employment (ICSE), approved by the United Nations Statistical Commission in 1958 and revised at the 15th International Conference of Labour Statisticians in 1993. The ICSE defines six status categorizes that are largely based on the type of economic risk associated with the job, an element of which is the strength of the attachment between the person and the job, and the type of authority over establishments and other workers which the job incumbents have or will have.

The 1993 ICSE employment statuses are: (1) wage and salary workers, also known as employees; (2) self-employed workers with employees, also known as employers; (3) self-employed workers without employees, also known as own-account workers; (4) members of producers' cooperatives;

(5) contributing family workers, also known as unpaid family workers; and (6) workers not classifiable by status. For full definitions of all status groups, see the Resolution concerning the international classification of status in employment, adopted by the 15th International Conference of Labour Statisticians, Geneva, 1993.

 $Website: www.ilo.org/global/What_we_do/Statistics/standards/resolutions/lang--en/docName--WCMS_087562/index.htm.$

The 1993 ICSE defines *own-account workers* as: those workers who, working on their own account or with one or more partners, hold the type of jobs defined as a "self-employment jobs" (i.e. jobs where the remuneration is directly dependent upon the profits derived from the goods and services produced), and have not engaged on a continuous basis any employees to work for them.

The 1993 ICSE defines *contributing family workers* as: those workers who hold "self-employment jobs" as own-account workers in a market-oriented establishment operated by a related person living in the same household.

Employment refers to people above a certain age who worked or held a job during a specified reference period (as defined in the Resolution concerning statistics of the economically active population, employment, unemployment and underemployment, adopted by the 13th International Conference of Labour Statisticians, October 1982). Included are: persons who worked for pay or profit (or pay in kind), persons who were temporarily absent from a job for such reasons as illness, maternity or parental leave, holiday, training or industrial dispute, and unpaid family workers who work for at least one hour. The measure is intended to capture persons working in the formal and informal sectors and households.

Sources and data collection

Data could be obtained from population censuses, labour force or other household surveys, administrative records and official estimates based on results from several of these sources. Labour force surveys can be designed to cover virtually the entire population of a country, all branches of economic activity, all sectors of the economy, and all categories of workers, including own-account workers, unpaid family workers and persons engaged in the informal economy. For this reason, household-based labour force surveys offer a unique advantage for obtaining information on the labour market of a country and its structure. [See section in employment-to-population ratio, indicator 1.5 for more information.]

Disaggregation: Ideally, the data should be disaggregated by sex and age group. Countries might also want to consider disaggregating according to urban/rural residence.

Rationale

Vulnerable employment is a newly defined measure of persons who are employed under relatively difficult circumstances as indicated by the status in employment. Because contributing family workers and ownaccount workers are less likely to have formal work arrangements, access to benefits or social protection programmes and are more "at risk" to economic cycles, these are the statuses categorized as "vulnerable".

The indicator is highly gender sensitive since, historically, contributing family work is a status that is dominated by women. There is also a connection between vulnerable employment and poverty: if the proportion of vulnerable workers is sizeable, it may be an indication of widespread poverty. The connection arises because workers in the vulnerable statuses lack the social protection and safety nets to guard against times of low economic demand and often are incapable of generating sufficient savings for themselves and their families to offset these times.

Comments and limitations

The indicator is not without its limitations; some wage and salaried workers might also carry high economic risk and some own-account workers might be quite well off and not vulnerable at all. But, despite the limitations, vulnerable employment is especially relevant for the less developed economies and regions, and the fact that a strong correlation has been established between high poverty rates for a region and high shares in vulnerable employment does substantiate the weight of the new indicator to measure progress towards the goal of decent employment for all.

When using the indicator on status in employment to assess vulnerable employment, one has to bear in mind that there are often differences in definitions, as well as in coverage, across countries and for different years, resulting from variations in information sources and methodologies that make comparisons difficult. Some definitional changes or differences in coverage can be overlooked, for example, differing age limits for measurement of employment. What is more important to note is that information from labour force surveys is not necessarily consistent in terms of what is included in employment. For example, the information supplied by some countries may relate to civilian employment, which can result in an underestimation of "employees" and "workers not classifiable by status", especially in countries that have large armed forces. The other two categories, self-employed and contributing family workers, would not be affected, although their relative shares would be.

Data for global and regional monitoring

Data for global and regional monitoring for this indicator is reported by the International Labour Organization, Employment Trends Unit, Geneva, Switzerland.

The majority of ILO data for the employment-to-population ratios reflect nationally-reported data collected by the ILO Department of Statistics or other international organizations such as the Organisation for Economic Co-operation and Development. The full dataset of available country-level status in employment data are reported in table 3 of the Key Indicators of the Labour Market dataset; www.ilo.org/kilm.

Sources of discrepancies between reported MDG indicators and national indicators: The ILO reports only available country-level information for this indicator. Therefore, no discrepancies are likely to exist.

MDG Goal 3: Promote gender equality and empower women MDG Target 3A: Eliminate gender disparity in primary and secondary education, preferably by 2005, and in all levels of education no later than 2015

20

Indicator: description and method of computation

The indicator is the share of female workers in wage employment in the non-agricultural sector expressed as a percentage of total wage employment in the non-agricultural sector.

Share of women in wage employment in the nonagricultural sector $\frac{\text{Number of women in paid employment}}{\text{Total number of people in paid employment}} \times 100$

Definitions

Employment refers to people above a certain age (typically 15 years) who work or hold a job during a specified reference period (as defined in the Resolution concerning statistics of the economically active population, employment, unemployment and underemployment, adopted by the 13th ICLS, October 1982).

Wage employment refers to wage earners and salaried employees, or "persons in paid employment jobs". Employees are typically remunerated by wages and salaries, but may be paid by commission from sales, piece-rates, bonuses or paid in kind by food, housing, training, etc. These persons are in wage employment as opposed to self-employment (i.e. employers, own-account workers, members of producers' cooperatives and contributing family workers).³

The non-agricultural sector includes industry and services. 'Industry' includes mining and quarrying (including oil production), manufacturing, construction, electricity, gas, and water, corresponding to divisions 2-5 in the International Standard Industrial Classification of all Economic Activities (ISIC-Rev. 2)⁴, and to tabulation categories C-F in ISIC-Rev. 3,⁵ and finally to tabulation categories B-F in ISIC-Rev. 4.⁶ 'Services' include wholesale and retail trade and restaurants and hotels; transport, storage, and communications; financing, insurance, real estate, and business services; and community, social, and personal

- 3. The different statuses of employment are defined according to the International Classification by Status in Employment (ICSE), approved by the United Nations Statistical Commission in 1958 and revised at the 15th International Conference of Labour Statisticians (ICLS) in 1993, available at: http://www.ilo.org/public/english/bureau/stat/download/res/icse.pdf.
- 4. http://unstats.un.org/unsd/cr/registry/regcst.asp?Cl=8&Lg=1
- $5. \ http://unstats.un.org/unsd/cr/registry/regcst.asp?Cl=2\&Lg=1$
- 6. http://unstats.un.org/unsd/cr/registry/regcst.asp?Cl=27

services, corresponding to divisions 6-9 in ISIC-Rev. 2, to tabulation categories G-Q in ISIC-Rev. 3, and finally to tabulation categories G-U in ISIC/Rev.4

Sources and data collection

While labour force surveys constitute a primary source of information, some of the data can also be obtained from other sources including population censuses, establishment censuses and surveys, other household surveys, administrative records, and official estimates based on results from these sources. Sources differ in coverage, scope, units of measurement and methods of data collection. Each source has advantages and limitations in terms of the cost, quality and type of information yielded. The results from various sources could be combined, provided that concepts, definitions, coverage, reference period, classification, etc. are consistent.

Labour force surveys allow for the joint measurement of employed, unemployed and economically inactive. They can be designed to cover virtually the entire population of a country, all branches of economic activity, all sectors of the economy and all categories of workers. This gives household based surveys a unique advantage in providing information on the total labour force and its structure.

Population censuses, often held every ten years, typically identify the economically active population ("labour force," comprising the employed and unemployed), branch of economic activity and status in employment. These data provide an indispensable benchmark for analysis of the labour force but more frequent household surveys are needed to measure current levels and trends.

Employment information from *other types of household surveys* may be considered, such as income and consumption surveys, demographic and health surveys, living standards measurement and Multiple Indicator Cluster Surveys (MICS).

Establishment censuses and surveys are useful in obtaining data on employment for specific groups of workers and industries. Also, they allow data on employment to be related more accurately to data on earnings, skills, occupation and industry. They are more precise and less costly, but can be more limited in coverage and content.

Other potential sources include *enterprise surveys and social insurance records*. These data can be useful in examining various sectors of the labour market but can provide only a very limited picture of the situation for the labour force as a whole.

Comparability of data from different sources: Various sources of data (e.g. population censuses, labour force/household surveys, establishment surveys, administrative records and official estimates that are based on results from several sources) may be available for different or same points in time. However, such disparate sources are seldom completely comparable in their sampling methods, coverage and definitions and the results should be considered with great care in trying to compare trends over time. There are a number of reasons why the data obtained from different sources may not easily be combined:

- Population and geographical coverage Each source has its own characteristics and provides certain types of data. Population censuses, labour force surveys and official estimates may cover the whole relevant population. Results from establishment surveys and administrative records are likely to cover only large private and public sector employers, in particular in developing countries. Depending on the source, the measurement and coverage may differ over time.
 - Labour force and household surveys may have limited geographical scope (e.g. be limited to major cities or urban areas). Other geographical limitations may include certain remote areas and conflict zones. Population exclusions may include younger or older age groups where there is nevertheless significant employment, members of the armed forces, temporary migrants working abroad and indigenous populations.
- Conceptual variation Although there are clear international standards, countries may use different definitions for employment status, especially for part-time workers, students, members of the armed forces, and household or contributing family workers in different surveys. National statistical offices, even when using ILO conceptual guidelines, do not necessarily use consistent definitions or classifications.

Disaggregation: Analysis of the indicator can be carried out using the following disaggregations: geographical, urban/rural, age groups, income and ethnic groups.

Possible disaggregations will vary, depending on the sample design. Countries, could additionally and for analytical purposes tabulate data by: branches of industry, hours worked, presence of small children and working time arrangements.

Disaggregation of data should assist policy makers in monitoring the progress achieved, creating an enabling environment that promotes decent, productive work for women, and implementing specifically targeted policies and programmes.

Rationale

The indicator measures the degree to which women have equal access to paid employment. With growing levels of development and related structural economic changes, production tends to move from the agricultural sector towards the non-agricultural sectors. At the same time, this causes a movement to paid employment jobs away from other types of jobs, with an accompanying emergence of monetized industrial and services sectors. The extent to which women have access to paid employment could thus reflect their integration into the monetary economy while benefiting from a more regular and largely monetary income. This in turn could be expected to have a positive impact on women's autonomy, self-reliance in household and personal development and decision-making power.

It also indicates the degree to which labour markets are open to women in industry and services sectors, which affects not only equal employment opportunity for women, but also economic efficiency through flexibility of the labour market and the economy's capacity to adapt to changes over time.

The indicator may vary from 0 per cent to 100 per cent (i.e. all paid employment in the non-agricultural sectors is accounted for by women). Equal numbers of women and men in the non-agricultural sectors would give the indicator a value of 50 per cent.

It should be emphasized that there is no optimal share for women in paid employment, and a fuller assessment of the level and development of the indicator should be made in conjunction with other labour market indicators. When interpreting the indicator, the share of women in total employment, unemployment and the economically active population should be taken into account in order to assess whether women are under- or over-represented in non-agricultural wage employment. It is also important to consider information on employment by status in employment, because it is known that women are more likely to work as unpaid family workers. Additional information on the situation of women in the labour market that should be analysed include level of education, level of remuneration, wage differentials, and women's and men's access to social protection. Changes in the share of women in paid employment over time should also be analysed. An increase in the indicator, meaning that more women have gained wage employment, often has a positive influence on poverty reduction. Creation of decent and productive work for women is a key strategy for the economic empowerment of women and their families.

Low shares, or a declining share of women in wage employment, calls for policies to increase the employment opportunities for women, both in terms of access to and in terms of quality of jobs. Analysis of additional labour market and other information is needed to inform more specific labour market policies. Employment policies should aim at eliminating the remaining pay differences originating from gender discrimination, through a approaches that address the underlying causes, including sectoral and occupational segregation, education and training, job classification and payment systems.

Comments and limitations

The main limitation of this indicator is that it does not fully reflect quality, especially the economic benefits of women's employment. In many developing countries, non-agricultural wage employment represents only a small portion of total employment so this indicator has limited value in considering the situation of women. To overcome this limitation, the indicator should be considered along with additional information on the share of women in total employment to allow an assessment of whether women are under- or over-represented in non-agricultural wage employment. In developing countries where the most of the employment is in agriculture or/is unpaid, additional indicators are needed to evaluate the situation of women in the labour market, such as their level of education, level of remuneration and wage differentials, and the extent to which women and men benefit from labour legislation and social programmes.

Further, the indicator does not reveal any differences in the quality of the different types of non-agricultural wage employment in terms of earning, conditions of work, or the provision of legal or social protection. Gender issues: In developing countries and outside the agricultural sector, wage employment is a middle-class, mainly urban phenomenon. Outside of urban areas, to the limited extent non-agricultural paid employment exists, it is more likely available to men. Men more often hold regular and better remunerated jobs, whereas women are frequently in peripheral, insecure, less valued jobs, as home workers, casual workers or part-time or temporary workers.

As economies develop, the share of women in non-agricultural wage employment often becomes increasingly important. A higher share of women in paid employment can improve their economic security and well-being. However, this shift is not automatic, nor does it account for differentials in working conditions between men and women.

Data for global and regional monitoring

Data for global and regional monitoring for this indicator are reported by the International Labour Organization, Department of Statistics in Geneva.

Comprehensive statistics on total and paid employment disaggregated by sex, branch of economic activity, occupation and status in employment are collected annually through a specialized questionnaire sent directly to national statistical authorities. Statistics are also sourced from national statistics publications and web sites.

These statistics are disseminated online in the ILO Database on Labour Statistics (LABORSTA), http://laborsta.ilo.org/.

The ILO Department of Statistics also collects and disseminates the relevant methodological information on national practices (ILO, "Sources and Methods" http://laborsta.ilo.org/).

Regional and global estimates: Global and regional estimates are calculated as weighted averages of the country level indicator where the weights correspond to each country's share in the total economically active population in the non-agricultural sector in the region/world in the benchmark year 1990.⁷ The total economically active population in the non-agricultural sector in the region/world is estimated on the basis of the same concept in the countries for which the indicator (observed or imputed) is available. As the estimates of economically active population in the non-agriculture are not available for about 20 countries and territories (mainly small islands with population of less than 30'000), their weights are estimated by assuming that about one third of the total population is active in the non-agriculture sectors.

The formula used to estimate the indicator at the regional and global level is as follows: $_{N}$

$$I_w = \frac{\sum_{i=1}^{N} w_i I_i}{\sum_{i=1}^{N} w_i}$$

Where Ii is the indicator for country *i* and *wi* is the share of country i in the total economically active population in non-agricultural sector in the world.

Treatment of missing values and aggregation: Where country data are not available, and there is no an auxiliary variable that can be used as a proxy indicator, the values are imputed. These imputed values are used solely for the production of the regional and global estimates. Their use for monitoring at the national level may not be most appropriate.

In order to impute the missing values for the indicator, various multilevel modelling techniques (5 basic models and their variants) have been developed and tested. The model adopted was selected on the basis of its goodness-of-fit to the existing data as well as its predictive power, as determined through a jack-knife procedure. The model is fitted separately for each region and takes into account the variation over time within and between countries. The missing values are predicted on the assumption that the data that are available for a given country are representative of that country's deviation from the average trend across time, which is estimated based on the whole sample in the region.

Discrepancies between national and global data: Although the national data are not altered in any way, discrepancies may happen due to the use of:

- different sources;
- different series from the same source;
- changes in the definitions and classifications over time (in the same source);
- estimates when the national data are not available for a particular year;
- imputations.

The lack of country data is a major source of discrepancies between national and global data.

Where data on paid employment does not exist or otherwise are not available, proxy series (total paid employment or total employment in non-agriculture rather than paid employment in non-agriculture) have been used. This is based on the assumption that the share of women in total paid employment is not significantly different from that for paid employment in non-agriculture. Sensitivity analysis conducted on a selected number of countries shows that there is strong correlation between the indicator and the auxiliary variable.

If a country has indicator values for some years but not for others, it is assumed that the value of the indicator in the missing years is not abnormal. The values for the missing years are estimated on the basis of the changes in correlated series from another source/series.

Where data from multiple sources or multiple series from the same source are available, the selection of the most appropriate one is based on a number of criteria, e.g. the consistency of concepts, definitions and classifications with the international standards, the quality of data, the availability of methodological information, availability of data/source over time, etc.

Discrepancies may also exist because of different definitions and classifications. Although there are clear international standards for the relevant concepts, countries may use different definitions for employment status, especially for part-time workers, students, members of the armed forces, and household or contributing family workers. National statistical offices, even when using ILO conceptual guidelines, do not necessarily follow the same definitions or classifications over time. Also the geographical and population coverage may differ over time. Rather than adjusting the data, all departures from the standards are indicated in notes that identify source, and changes or deviations in coverage.

B.2. Country example: Pakistan

Introduction

A set of indicators has been adopted to provide a basis to assess the achievement of full and productive employment and decent work for all in the context of the MDGs. Under MDG 1 (Eradicate extreme poverty and hunger), this set includes: (1) the employment-to-population ratio; (2) the share of vulnerable employment in total employment; (3) the share of working poor in total employment; and (4) the growth rate of labour productivity. In addition, under MDG 3 (Promote gender equality and empower women) the set includes the share of women in wage employment in the non-agricultural sector. This section provides an example of a brief analysis of these indicators in the case

of Pakistan. The analysis is followed by an overall assessment of labour markets in this country and linkages with decent employment policy development.¹

Since 2000, a wide ranging program of economic reforms has been introduced by the Government of Pakistan. The reform policies, together with official and private transfers have contributed to relatively high economic growth rates during 2003-07, which exceeded the average growth in the 1990s (at 4.6 per cent). Against this economic backdrop, labour market improvements can be seen during this period, but a number of structural challenges have remained, as also borne out by the four indicators.

Employment-to-population ratios

Employment-to-population ratios, which express the number of people in employment as a percentage of the population for the corresponding age group (either 15 years and over or youth aged 15-24) and sex, indicate the ability of an economy to provide employment. Most economies have employment-topopulation ratios in the range 55 to 75 per cent, but as shown in Table 1 the region of South Asia is at the low end of this range. In Pakistan, the employmentto-population ratio is very low at 49.8 per cent of the adult population (15+) in 2006/2007. This low ratio is primarily due to the low ratio for women, which at 19.4 per cent is about four times lower than the male rate (see figure 1). The ratio for males is not exceptional in the South Asian context. The employment-to-population ratio for women has clearly

improved, by almost six percentage points since the beginning of the decade, and the gap between male and female ratios has been reduced. Nevertheless, this gap continues to be considerable, even from a regional perspective.

For youth, the employment-to-population ratio increased by almost six percentage points between 1999/2000 and 2006/2007, and has converged with the average in South Asia (table 2 and figure 2). Furthermore, the convergence is again driven by the changing position of women in the labour market. The female youth employment-to-population ratio increased from the very low level of 7.2 per cent in 1999/2000 to 16.8 per cent in 2006/2007. Similar to the adult rate, there remains a considerable gap between female and male youth employment-to-population rates.

- 1. See *Pakistan Employment Trends No. 4* (Islamabad, Ministry of Labour and Manpower, December 2008), for a more detailed analysis of the four indicators (www.molm.gov.pk).
- 2. Economic Survey 2007/08 (Islamabad, Government of Pakistan, Ministry of Finance, 2008).

Table 1. Employment-to-population ratio (%)

15+	1999/ 2000	2001/ 2002	2003/ 2004	2005/ 2006	2006/ 2007	Change 1999/2000 to 2006/2007 (percentage points)
Both Sexes	46.8	46.5	47.0	49.7	49.8	+3.0
Males	78.6	77.6	77.6	79.6	79.6	+1.0
Females	13.7	13.6	15.6	19.0	19.4	+5.7
South Asia	2000	2002	2004	2006		
Both Sexes	57.2	57.7	58.1	57.8		
Males	79.6	79.8	79.9	79.6		
Females	33.4	34.2	35.1	34.7		

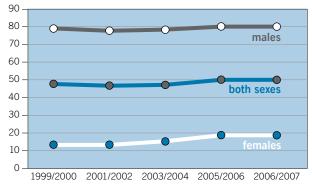
Source: Federal Bureau of Statistics (FBS), Pakistan Labour Force Survey (Islamabad, various years), and ILO, Key Indicators of the Labour Market (Geneva, 7th edition, 2011)

Table 2. Youth employment-to-population ratio (%)

15-24	1999/ 2000	2001/ 2002	2003/ 2004	2005/ 2006	2006/ 2007	Change 1999/2000 to 2006/2007 (percentage points)
Both Sexes	35.1	37.6	38.5	42.0	40.9	+5.8
Males	61.6	61.8	62.7	66.1	64.2	+2.6
Females	7.2	11.8	13.7	16.8	16.8	+9.6
South Asia	2000	2002	2004	2006		
Both Sexes	43.1	43.7	44.0	42.7		
Males	59.6	59.9	60.0	58.6		
Females	25.4	26.3	26.8	25.7		

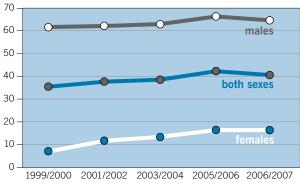
Source: Federal Bureau of Statistics (FBS), Pakistan Labour Force Survey (Islamabad, various years), and ILO, Key Indicators of the Labour Market (Geneva, 7th edition, 2011)

Figure 1. Employment-to-population ratio (population aged 15 and above, %)



Source: FBS, Pakistan Labour Force Survey (Islamabad, various years)

Figure 2. Youth employment-to-population ratio (population aged 15–24, %)



Source: FBS, *Pakistan Labour Force Survey* (Islamabad, various years)

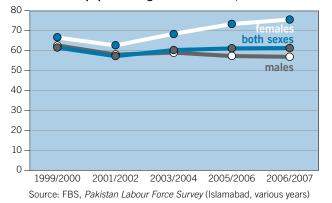
It should be emphasised that there is no single correct employment-to-population ratio for adults or for youth, and a fuller assessment of the level and development of these ratios should be made in conjunction with

other labour market indicators. In the case of youth, it is important to consider information on labour market inactivity, unemployment and enrolment in education programs.

Vulnerable employment

Vulnerable employment, a relatively new concept that was recently introduced is based on status in employment, and is calculated as the sum of contributing family workers and own-account workers as a percentage of total employment of the relevant group (both sexes, males, or females).³ This indicator captures the proportion of workers whom are less likely to have formal work arrangements, and are therefore more likely to lack elements associated with decent employment. The poverty connection arises because workers in the vulnerable statuses are most likely to lack the social protection and safety nets to guard against times of low economic demand and often are

Figure 3. Vulnerable employment rate (population aged 15 and above, %)



incapable of generating sufficient savings for themselves and their families to offset these times.

The two groups that constitute vulnerable employment in Pakistan are showing a very different pattern in the labour market. Contributing family work as a share of all employment increased by 5.2 percentage points between 1999/2000 and 2006/2007, while own account work showed a large decline by 7.6 percentage points (table 3 and figure 3). Overall, this resulted in a decrease in vulnerable employment by 2.4 percentage points. This decrease mostly falls together with the increase in status group of employees, as the proportion of employers hardly changed in recent years.

Again, men and women show distinct developments in the labour market. Considering men, vulnerable employment showed a strong decrease, with a small increase in contributing family work. Females, on the other hand, witnessed an enormous increase in contributing family work, and a relative decline in the status group of employees from a third of all female employed in 1999/2000 to around a quarter in 2006/2007. Given the rising employment-to-population ratio for women, it is clear that an important part of the inflow of women in the labour market in recent years has been absorbed in vulnerable employment. Different positions of men and women in the labour market are also evident from the share of women in paid employment. In the second half of the 1990s some progress was achieved, but

Table 3. Status in employment (%)

15+	1999/ 2000	2001/ 2002	2003/ 2004	2005/ 2006	2006/ 2007	Change 1999/2000 to 2006/2007 (percentage points)
Employees						
Both Sexes	35.9	40.4	38.5	38.4	38.3	+2.4
Males	36.4	40.9	39.8	41.2	41.5	+5.1
Females	33.1	37.1	31.5	26.6	25.1	-8.0
Employers						
Both Sexes	0.8	0.9	0.9	0.9	0.9	+0.1
Males	0.9	0.9	1.1	1.1	1.0	+0.1
Females	0.1	0.3	0.1	0.1	0.1	0.0
Own-Account V	Vorkers					
Both Sexes	43.7	39.9	38.6	36.8	36.1	-7.6
Males	48.2	43.8	42.9	41.5	41.3	-6.9
Females	16.8	16.5	17.0	16.2	14.4	-2.4
Contributing Fa	mily Workers					
Both Sexes	19.5	18.8	22.0	23.9	24.7	+5.2
Males	14.5	14.3	16.2	16.2	16.2	+1.7
Females	49.9	46.1	51.4	57.0	60.4	+10.5

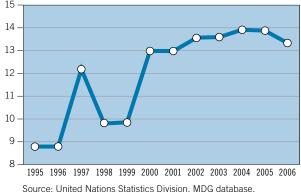
Source: FBS, Pakistan Labour Force Survey (Islamabad, various years)

Table 4. Status in employment for youth (%)

15-24	1999/ 2000	2001/ 2002	2003/ 2004	2005/ 2006	2006/ 2007	Change 1999/2000 to 2006/2007 (percentage points)
Employees						
Both Sexes	39.6	44.0	40.6	40.3	41.6	+1.9
Males	39.5	44.3	42.0	43.0	44.8	+5.3
Females	40.8	42.4	33.8	29.3	28.7	-12.1
Employers						
Both Sexes	0.1	0.1	0.3	0.2	0.2	+0.1
Males	0.1	0.1	0.3	0.2	0.2	+0.1
Females	0.0	0.4	0.0	0.1	0.2	+0.2
Own-Account V	Vorkers					
Both Sexes	20.5	19.1	18.6	18.0	16.5	-4.0
Males	21.3	20.7	20.2	19.7	18.4	-2.9
Females	13.6	10.4	11.7	11.4	9.1	-4.5
Contributing Fa	amily Workers					
Both Sexes	39.5	36.7	40.4	41.1	41.7	+2.2
Males	38.9	34.8	37.4	36.7	36.5	-2.3
Females	45.5	46.8	54.6	59.0	61.9	+16.4

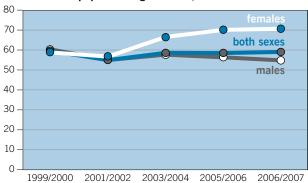
Source: FBS, Pakistan Labour Force Survey (Islamabad, various years)

Figure 4. Share of women in paid employment (%)



Source: United Nations Statistics Division, MDG database, available at: http://mdgs.un.org/unsd/mdg/Default.aspx

Figure 5. Youth vulnerable employment rate (population aged 15-24, %)



Source: FBS, Pakistan Labour Force Survey (Islamabad, various years)

during 2000 to 2006 the share remained at a low level between 13 and 14 per cent (figure 4).4

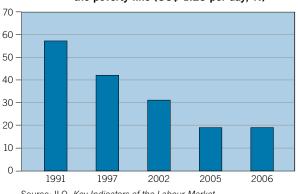
Developments in youth labour markets are not much different from those in the overall labour market. Vulnerable employment decreased by 1.9 percentage points, but this is the result of a strong decline for males and an even stronger increase in vulnerable employment for females (table 4 and figure 5). The overall positive outcome (decline in vulnerable employment) is the result of the predominance of men in the labour market.

Share of working poor in total employment and labour productivity growth rates

Working poor are defined as employed persons living in a household in which each member is estimated to be below the poverty line. Working poverty provides a clear indication of the lack of decent work: if a person's work does not provide an income sufficient enough to lift him or herself and her family out of poverty, then these jobs, at the very least, do not fulfil the income component of decent work and it is

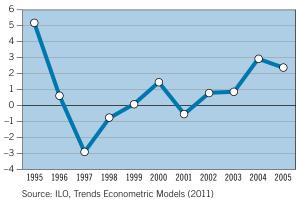
^{4.} The share of women in paid employment is used as a proxy for MDG Indicator 3.2, which is the share of women in wage employment in the non-agricultural sector.

Figure 6. Proportion of employed people living below the poverty line (US\$ 1.25 per day, %)



Source: ILO, Key Indicators of the Labour Market (Geneva, 7th edition, 20011)

Figure 7. Labour productivity growth rate, based on constant 2005 international \$ (%)



likely that other components are not being fulfilled either.

There are strong linkages between vulnerable employment, working poverty and labour productivity. Labour productivity is used to assess the likelihood that an economic environment creates and sustains decent employment opportunities with fair and equitable remuneration. Productivity increases obtained through investment, trade, technological progress or changes in work organization can lead to increases in social protection and poverty reduction, and, therefore, have the potential to reduce vulnerable employment and working poverty. Increases in productivity do not

guarantee improvements in these areas, but without productivity growth, and thereby induced economic growth, improvements are highly unlikely.

In Pakistan, using the international poverty line of US\$1.25 per day, the share of working poor decreased from 1991 to 2006 by thirty-eight percentage points, with 19.2 per cent of all workers estimated to be among the working poor in 2006 (figure 6). Productivity growth rates do not show a clear pattern, and during the second half of the 1990s negative rates were registered in several years (see figure 7, using constant US\$ at PPP). In more recent years productivity growth shows some improvement, but remains volatile.

Overall assessment and policy linkages

Healthy productivity rates provide the basis for the achievement of decent work and the reduction of working poverty. In Pakistan, recent achievements should be seen in the context of reforms in economic and social policies, and higher economic growth rates, which set the country on a path to achieve MDG 1.

All four indicators show positive developments in Pakistan, but also highlight important challenges. In particular, the large majority of the employed, both adult and youth, are in vulnerable employment, and one out of five of the employed belongs to the working poor. This situation calls for policies to stimulate the

creation of decent employment, and to translate economic growth in better labour market outcomes. Productivity is the key, and investments need to be made to sustain healthy productivity growth rates. Analysis of additional labour market and other information is needed to inform more specific labour market policies.⁵

It is clear that Pakistan faces a special gender challenge. The analysis, in particular the gender gaps, points at the need for continued policies to improve the position of women in the labour market, both in terms of access to jobs and in terms of quality of jobs.

B.3. Decent Work Indicators (full proposed set)

Note: This set of Decent Work Indicators was compiled in accordance with the guidance received at the Tripartite Meeting of Experts on the Measurement of Decent Work, held in Geneva from the 8th to the 10th of September 2008. It is still under development and will be further revised after the completion of Decent Work Country Profiles for five pilot countries. See http://www.ilo.org/integration/themes/mdw/lang--en/index.htm.

Substantive element of the Decent Work Agenda	Statistical indicators	Information on rights at work and the legal framework for decent work
Numbers in brackets refer to ILO strategic objectives: 1. Standards and fundamental principles and rights at work; 2. Employment; 3. Social protection; 4. Social dialogue.	Selection of relevant statistical indicators that allow monitoring progress made with regard to the substantive elements. M – Main decent work indicators A – Additional decent work indicators F – Candidate for future inclusion / developmental work to be done by the Office C – Economic and social context for decent work (S) Indicate that an indicator should be reported separately for men and women in addition to the total See Appendix table 2 of the discussion paper for full discussion of statistical indicators (reference number in brackets; n.a. where no reference number is available).	Description of relevant national legislation in relation to the substantive elements of the Decent Work Agenda; where relevant, information on the benefit level; evidence of implementation effectiveness and the coverage of workers in law and in practice; complaints and representations received by the ILO; observations by the ILO supervisory system and cases of progress; information on the ratification of relevant ILO Conventions (1, 2, 3 + 4) L – Subject covered by information on rights at work and the legal framework for decent work See Appendix table 4 of the discussion paper for full discussion of information on rights at work and the legal framework for decent work.
Employment opportunities (1 + 2)	 M - Employment-to-population ratio, 15-64 years (S) M - Unemployment rate (S) M - Youth not in education and not in employment, 15-24 years (S) M - Informal employment (S) A - Labour force participation rate, 15-64 years [to be used especially where statistics on Employment-to-population ratio and/or Unemployment rate (total) are not available] A - Youth unemployment rate, 15-24 years (S) A - Unemployment by level of education (S) A - Employment by status in employment (S) A - Employment by status in employment (S) A - Proportion of own-account and contributing family workers in total employment (S) [to be used especially where statistics on informal employment are not available] A - Share of wage employment in non-agricultural employment (S) F - Labour underutilization (S) Memo item: Time-related underemployment rate (S) grouped as A under "Decent hours" 	L - Government commitment to full employment L - Unemployment insurance

Substantive element of the Decent Work Agenda	Statistical indicators	Information on rights at work and the legal framework for decent work
Adequate earnings and productive work (1 + 3)	 M - Working poor (S) M - Low pay rate (below 2/3 of median hourly earnings) (S) A - Average hourly earnings in selected occupations (S) A - Average real wages (S) A - Minimum wage as % of median wage A - Manufacturing wage index A - Employees with recent job training (past year / past 4 weeks) (S) 	L – Statutory minimum wage
Decent hours (1 + 3)	 M - Excessive hours (more than 48 hours per week; 'usual' hours) (S) A - Usual hours worked (standardized hour bands) (S) A - Annual hours worked per employed person (S) A - Time-related underemployment rate (S) F - Paid annual leave (developmental work to be done by the Office; additional indicator) 	L – Maximum hours of work L – Paid annual leave
Combining work, family and personal life $(1+3)$	F – Asocial / unusual hours (Developmental work to be done by the Office) F – Maternity protection (developmental work to be done by the Office; main indicator)	L – Maternity leave (incl. weeks of leave, replacement rate and coverage) L (additional) – Paternity and parental leave
Work that should be abolished (1 + 3)	 M - Child labour [as defined by draft ICLS resolution] (S) A - Hazardous child labour (S) F - Other worst forms of child labour (S) F - Forced labour (S) 	L – Child labour (incl. public policies to combat it) L – Forced labour (incl. public policies to combat it)
Stability and security of work (1, 2 + 3)	 M – Stability and security of work (developmental work to be done by the Office). A – Number and wages of casual/daily workers (S) Memo item: Informal employment grouped under employment opportunities. 	L – Employment protection legislation (incl. notice of termination in weeks) Memo item: Unemployment insurance grouped under employment opportunities; needs to be interpreted in conjunction for 'flexicurity'.

Substantive element of	Statistical indicators	Information on rights at work
the Decent Work Agenda		and the legal framework for decent work
Equal opportunity and treatment in employment (1, 2 + 3)	 M - Occupational segregation by sex M - Female share of employment in International Standard Classification of Occupations (ISCO-88) groups 11 and 12 A - Gender wage gap A - Indicator for Fundamental Principles and Rights at Work (Elimination of discrimination in respect of employment and occupation) to be developed by the Office A - Measure for discrimination by race / ethnicity / of indigenous people / of (recent) migrant workers / of rural workers where relevant and available at the national level. F - Measure of dispersion for sectoral / occupational distribution of (recent) migrant workers F - Measure for employment of persons with disabilities Memo item: Indicators under other substantive elements marked (S) indicator should be reported separately for men and women in addition to the total. 	L – Anti-discrimination law based on sex of worker L – Anti-discrimination law based on race, ethnicity, religion or national origin
Safe work environment (1+3)	 M - Occupational injury rate, fatal A - Occupational injury rate, non-fatal A - Time lost due to occupational injuries A - Labour inspection (inspectors per 10,000 employed persons) 	L – Occupational safety and health insurance L – Labour inspection
Social security (1 + 3)	 M - Share of population aged 65 and above benefiting from a pension (S) M - Public social security expenditure (% of GDP) A - Health-care expenditure not financed out of pocket by private households A - Share of population covered by (basic) health care provision (S) F - Share of economically active population contributing to a pension scheme (S) F - Public expenditure on needs-based cash income support (% of GDP) F - Beneficiaries of cash income support (% of the poor) F - Sick leave (developmental work to be done by the Office; additional indicator) 	L – Pension (public / private) L – Incapacity for work due to sickness/sick leave L – Incapacity for work due to invalidity Memo item: Unemployment insurance grouped under employment opportunities.

Substantive element of the Decent Work Agenda	Statistical indicators	Information on rights at work and the legal framework for decent work
Social dialogue, workers' and employers' representation (1 + 4)	 M - Union density rate (S) M - Enterprises belonging to employer organization (rate) M - Collective bargaining coverage rate (S) M - Indicator for Fundamental Principles and Rights at Work (Freedom of Association and Collective Bargaining) to be developed by the Office A - Strikes and lockouts/rates of days not worked [interpretation issues] 	L – Freedom of association and right to organize L – Collective bargaining right L – Tripartite consultations
Economic and social context for decent work	C – Children not in school (% by age) (S) C – Estimated % of working-age population who are HIV (Human Immunodeficiency Virus) positive C – Labour productivity (GDP per employed person, level and growth rate) C – Income inequality (percentile ratio P90/P10, income or consumption) C – Inflation rate Consumer Price Index (CPI) C – Employment by branch of economic activity C – Education of adult population (adult literacy rate, adult secondary-school graduation rate) (S) C – Labour share in GDP C (additional) – Real GDP per capita in PPP\$ (level and growth rate) C (additional) – Female share of employment by industry (ISIC tabulation category) C (additional) – Wage / earnings inequality (percentile ratio P90/P10)	Developmental work to be done by the Office to reflect environment for sustainable enterprises, incl. indicators for (i) education, training and life-long learning, (ii) entrepreneurial culture, (iii) enabling legal and regulatory framework, (iv) fair competition, and (v) rule of law and secure property rights. Developmental work to be done by the Office to reflect to reflect other institutional arrangements, such as scope of labour law and scope of labour ministry and other relevant ministries.

Millennium Indicators

Operated by the UN Department of Economic and Social Affairs (UNDESA), this site contains country data by indicator; indicator definitions; indicator sources; country profiles; and explanations of each goal. http://mdgs.un.org/unsd/mdg/Default.aspx

MDG NET

This is a list serve which supports UN staff, country offices and civil society and provides a continuous flow of information on the MDGs. (Sign up through the website or send an e-mail to sarah.renner@undp.org). www.undg.org

Millennium Project

This site provides all related information on the MDG research initiative. www.unmillenniumproject.org

Official UN website

Provides general information on MDG activities, including press releases and reports from the Secretary-General; webcasts of UN/MDG events; fact sheets on the MDGs and the role of the UN; country reports and data; and statistics on the achievement of the MDGs.

http://www.un.org/millenniumgoals/

Monitoring and Assessing Progress on Decent Work

Further information on monitoring and assessing progress on decent work can be found on the ILO's web-site at http://www.ilo.org/integration/themes/mdw/lang--en/index.htm



Employment-to-population ratio

Poverty rate

Status in employment

Working-age population

For more information visit our web site: http://www.ilo.org/employment

International Labour Office Employment Sector 4, route des Morillons CH-1211 Geneva 22

