Engendering Statistics
A Tool for Change

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A Tool for Change

Att producera statistik med jämställdhetsperspektiv
Ett verktyg för förändring

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Preface

Issues of gender equality, equity and the empowerment of women are increasingly recognized as essential to the process of sustainable development. Gender issues today are not merely special concerns but are considered crucial elements in policies, plans and strategies. Women’s and men’s contributions to society, their partnership and full participation, their different needs and different access to resources are essential components in international platforms of action and strategies.

To promote action, inform policies and monitor changes the demand for statistics that reflect gender issues has increased over the years. There is growing awareness today of the need for statistics as a basis for policies, plans and programmes and to support the demand for equality and monitor changes.

A number of countries have taken steps to improve their statistical systems to better reflect gender issues in their official statistics. International networking and cooperation in this field are increasing and many projects have been implemented to develop the new field of gender statistics and assist national statistical offices in building up their gender statistics programmes.

The Swedish International Development Cooperation Agency (Sida) has assisted for many years a number of African countries in developing and improving their gender statistics. In June 1993, Sida started a project to support work on gender statistics in East, Central and Southern Africa, executed by Statistics Sweden. A first training workshop for national focal points on gender statistics from 13 countries was held in Gaborone, Botswana in August 1993. Francesca Perucci, as consultant to Statistics Sweden, and Birgitta Hedman and Pehr Sundström from Statistics Sweden, in collaboration with Grace Bediako, technical advisor on gender statistics at the United Nations Statistical Division developed the training material and conducted the workshop.

The material was also used for a similar training workshop for six countries in Asia, within a project executed by the United Nations Regional Commission for Asia and the Pacific and funded by Sida and UNIFEM.

The training material was revised and expanded and is now presented as an introductory manual directed to both producers and users of gender statistics. _Engendering Statistics: A Tool for Change_ is sponsored by Sida and Statistics Sweden. The revision and drafting of the text were conducted by Birgitta Hedman and Francesca Perucci. The compilation and presentation of data for the examples in Chapter 5 were prepared by Birgitta Hedman and Pehr Sundström. The final layout and typeset for printing was prepared by Lena Johansson. Pat Dean assisted in editing the final manuscript.
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Introduction

Gender statistics is a new field that cuts across all traditional statistical fields and pertains to the entire statistical system. The main requirement for the production and dissemination of statistics that reflect the realities of women and men is that users and producers work together to identify the issues to be addressed and the necessary statistical outputs. Producers need to be trained to improve their understanding of gender issues and to learn the requirements for the production of gender statistics. Users, on the other hand need to be trained on effectively using statistics in their work and expressing their demand to statisticians.

This book is targeted primarily to statisticians in national statistical offices and other governmental departments, and to trainers as a resource manual for training workshops and training in academic settings. It can also be used by users who wish to understand the problems involved in the production of gender statistics to be better able to use statistics correctly.

The book describes the various phases of the production of gender statistics, summarized in Chapter 1, An Overview of Gender Statistics, where also a flowchart describing all steps involved in the process of production is present-ed. The flowchart is reported in the mar-gin of the first page of each chapter to indicate which phase the chapter refers to.

Gender statistics are produced in close collaboration with users to respond to the needs of policy makers, researchers, the media and the public. In order for user’s needs to be fully considered, it is necessary to examine gender concerns and goals in society and iden-tify the necessary statistics and indicators to address them with adequate poli-cies and plans and to assess and monitor the related changes.

Chapter 2, Gender Issues, describes the development of different policy approaches from ‘women in development’ to ‘gender and development’, and presents some conceptual issues and key principles behind them. It also pro-vides an overview of the main gender concerns in various policy areas – de-ci-sion making, economic life, family and household, laws, health, violence, edu-ca-tion, environment. To what extent do women and men contribute in different ways to society and have a different access to and control over resources? Why do men have more power than women in all spheres of decision making in society? What are women’s and men’s different needs? How do women and men interrelate and share responsibility in family and social life? How do they manage natural resources and how are they affected by environmental changes?

The development of the entire statistical system and the planning and designing of statistical instruments aim at pro-ducing the adequate information to answer these questions and to pro-vide policy makers with the basis for the formulation and monitoring of their policies. Each question, problem and goal will originate the need for one or more statistics and indicators. Statisti-cians in collaboration with users identify these statistics and initiate the pro-duction process. Each step of the statistical production requires attention to the existence of gender issues and stereotypes in society, to fully reflect the reality and to avoid biases.
Chapter 3, *Statistics and Indicators on Gender Issues*, focuses on the stage of the production process where from gender issues the necessary statistics are identified, and describes the characteristics of the field of gender statistics. It answers some of the most common questions: Why do we need gender statistics? What is gender statistics? How do we address users’ needs?

During the last two decades, a lot has been done to improve the production and dissemination of statistics that reflect the actual situation of women and men in society. Concepts, definition, criteria for classification and survey methods have extensively been examined and often revised to improve the measurement of all aspects of women’s and men’s lives. Some data gaps have been filled and some measurement problems have been successfully addressed, but in many areas measurement remains problematic and data are often inadequate.

Chapter 4, *Data Availability and Quality*, discusses various aspects of data quality, in terms of problems and biases linked to the different roles of women and men in society and to the existence of gender-based stereotypes.

In order for statistics to be correctly used and reach a large audience they must be analysed to adequately show gender differentials and presented in a user-friendly way. Suitable ways of presentation and statistical products need to be identified for different groups of users.

Chapter 5, *Analysis and Presentation of Gender Statistics* and Chapter 6, *Statistical Publications on Gender Issues*, address problems of data presentation and data dissemination, respectively, guiding the reader through the steps necessary to obtain a statistical publication with easy-to-read tables and charts that clearly show gender issues and gender differentials.

Finally, Chapter 7, *Training in Gender Statistics*, provides guidelines on how to conduct a one-week training on gender statistics, using this book as a reference manual.
Gender Statistics
The Production Process

Users of statistics

Problems and questions in gender issues in society

Needs for improvement of the situation of women and men

Goals for equal opportunities

Needs for statistics from different fields

Relevant statistics and indicators

Producers of statistics

Available statistics

Sources

Quality relative to need

Data gaps

Possible sources

Need for improvement of content, measures, concepts, classifications

New data

Statistics to be analysed

Analysis

Presentation

Dissemination


Identify

Identify

Specify

List

Identify

Investigate

Specify

Collect

Compile

Analyse

Present

Disseminate
1. An Overview of the Gender Statistics Production Process

Statistics and indicators on the situation of women and men in all spheres of society are an important tool in promoting equality. Gender statistics have an essential role in the elimination of stereotypes, in the formulation of policies and in monitoring progress towards full equality. The production of adequate gender statistics concerns the entire official statistical system as well as different statistical sources and fields. It also implies the development and improvement of concepts, definitions, classifications and methods.

Statistics are used to raise consciousness and provide an impetus for change, to provide a foundation for of policies, programmes and projects and to monitor and evaluate such policies and measures.

The process to produce, present and disseminate statistics is the same irrespective of the statistical field. This book highlights the steps involved in the production, presentation and dissemination of statistics related to gender issues in society, but most of the discussion presented is also relevant to statistics in general.

A close and continuous cooperation between users and producers is crucial to successfully produce and improve gender statistics in a country. Users of statistics have different needs which producers of gender statistics have to meet with specific statistical products.

This process starts with a dialogue between users and producers. Users formulate their demands on the basis of their needs. Producers have to address users' specific needs. However, users are often inadequately informed on the availability of statistics and do not know how to accurately formulate their requests. Producers, on the other hand, are not trained to be sensitive to users' needs. Statisticians must strive to understand gender issues and problems to be addressed in data collection. Users must learn how to communicate their needs to statisticians and how to use statistics in their work. It is only through a close and continuous cooperation between users and producers that statistics can be produced that respond to actual needs and can be understood and used by everybody.

The national statistical system produces gender statistics on the basis of problems and goals identified in national policies and plans.

Statisticians, in collaboration with policy makers and other groups of users, look at gender issues, problems and the related goals identified at the national level. In order to participate in this important process, statisticians must understand gender issues and learn how to identify causes and effects of problems and interrelations among different issues. Experience has shown that statisticians trained in analytical structuring can help users to further specify problems and identify underlying causes and effects.
Users and producers together have looked at problem areas and specific concerns, their underlying causes and their effects. The next step is to identify statistics needed to address the problem/concern, investigate the causes, assess the effects and analyse the inter-relationships with other variables. All desired statistics and indicators have to be identified and listed, whether they are available and regularly produced or not.

Once needed statistics are identified and listed, their availability and quality have to be assessed. Inadequate concepts and definitions used in surveys and censuses and measurement problems result in both quality problems and data gaps. The causes of data gaps should be analysed and possible new sources investigated.

The need for improvement of statistics on the situation of women and men in all spheres of society and at different stages of the life cycle imply development of the national statistical system in a number of areas. Specific activities in various areas should be specified to address these needs and be part of a detailed plan for the development of statistics. Work on gender statistics falls into the following areas:

- Improvement of presentation and dissemination of existing gender statistics
- Improvement of measurement, concepts, definitions and classifications
- Extension of data collection programmes to provide needed statistics where data gaps exist

Statistics needed for gender analysis belong to different statistical fields and are often scattered in different publications or stored in different databases and are difficult to find. All statistical products should reflect the reality of women and men in society and present a correct measurement of their participation in social and economic life. However, it is also important that data related to gender be compiled and be made available in single statistical product (publication, diskette or other) tailored to the users’ needs.

Statisticians will prepare different products to suit the needs of the various groups of users: policy makers, planners, teachers, students, researchers, mass media, the public, etc. Data will be compiled and presented in booklets, books, posters, fact sheets and exhibitions or stored in databases available in diskettes, tapes or CDs. Depending on the audience and the intended use, the statistical product will vary from a simple and broad publication with basic indicators related to the main policy areas to databases containing detailed information on specific fields. For each statistical product the target groups and their needs for presentation must be identified early in the production process.

The way data are presented is also crucial for a correct use and interpretation of the data themselves. Tables and graphs should provide clear messages, attract readers, encourage further analysis and stimulate demand for more information.
The last step in the process concerns the dissemination of the statistical product. A plan for marketing and dissemination is developed early in the production process and activities to identify the right product for the target audience and to reach all potential users are carried out during the entire process. A successful dissemination plan includes activities to reach media and the public such as a press release and a press conference, promotional material, such as flyers and posters tailored to the target audience. Other events to present the product include workshops with users to inform about and discuss the contents of the publication and lectures by statisticians presenting gender statistics at seminars and courses on gender issues. Feedback from users of gender statistics is essential for future work on gender statistics. An evaluation should be made on whether the requirements were met and how useful the product was for the users. The evaluation should be based on personal contacts of statisticians involved in the preparation of the publication with users, in order to obtain their opinions on what needs to be improved, on the press coverage after the press release, on articles where the product is cited and references made by users in their work.

The production of gender statistics is a never ending process. It is a continuous process of integrating developments and improvements of gender statistics into the entire official statistical system. One statistical output of the production process creates a new insight of the situation of women and men and a new understanding of users’ needs. This in turn leads to new needs for gender statistics in the same area of concern or in new areas. Also, users working with statistics from a gender perspective stimulate demand for statistics from other users (policy makers, planners, researchers, teachers, students, the mass media, etc.) and in this way create new needs for statistics.

Components of gender statistics work:

- Selection of topics to be investigated.
- Identification of statistics to be collected to reflect gender issues in society.
- Formulation of concepts and definitions used in data collection that adequately reflect the diversities of women and men in society and capture all aspects of their lives.
- Development of data collection methods that take into account stereotypes and social and cultural factors that might produce gender-based biases.
- Development of analyses and presentation of data that can easily reach policy makers, planners and the largest audience possible.
The flowchart describes the main steps involved in the gender statistics production process, from identification of needs to dissemination of a specific product. The flowchart can also be used in a broader perspective to illustrate a gender statistics programme.

The goal of working with gender statistics is to ensure that statistics related to individuals are collected, compiled, analysed and presented by sex and age, and reflect issues and problems related to women and men in society. This implies that gender statistics cannot be produced and improved in isolation. A gender perspective is needed in all traditional statistical fields. The work must be integrated into the development of the overall national statistical system – mainstreaming. Improvement of content, methods, classifications, and measurements from a gender perspective should be made part of the ongoing work to improve all statistical sources – censuses, surveys and administrative systems.

Ideally, gender statistics should be established as an area of responsibility within the national statistical office. A special unit or a focal point for gender statistics should have a catalytic role for the user – producer cooperation and integration of gender statistics in all statistical fields. Representatives from the various areas of work – labour force, demography, education, health, national accounts, etc. – should collaborate in developing a plan of action to improve the statistical system to fully reflect gender issues in the country.

The basic work to improve gender statistics must be done at the national level. However, cooperation between countries is indispensable to share experience and make effective use of common resources, to develop a common strategy of work, to promote the use of relevant concepts, definitions and measurement methods for collection and presentation of statistics and to enable international comparisons.
2. Gender Issues

Women’s and men’s different roles in society and their interrelationships have an effect on the societal policies and plans. Women and men also have different needs and different access to and control over resources. They face different constraints in responding to economic change and are affected by policies and plans in different ways.

There is a growing awareness worldwide that gender issues have to be integrated into policies and plans and women’s advocates have strive to inform people of the importance of gender concerns at all levels.

What is a gender issue?

A critical distinction needs to be made between the terms sex and gender often used erroneously as synonyms.

The word **sex** simply refers to biological differences between women and men. Sex characteristics are universal and unchangeable.

**Gender** is a social construction and codification of differences between the sexes and social relationships between women and men. Gender inequalities are shaped through the history of social relations. The social identity of gender depends on ideological, historical, cultural, religious, ethnic and economic factors and can be changed by political, economic or cultural influences. **Gender relations** take different forms under different circumstances and are affected by other types of relations between people.

**Gender issues** relate to all aspects of women’s and men’s lives, their different opportunities, access to resources and needs.

There is growing awareness around the world that policies and measures affect women and men in different ways and that policies and plans need to be designed accordingly.

In almost all countries today there are organizations that work to promote equal opportunity for women and men and to design and implement special measures to ensure a full recognition of women’s and men’s interests and needs. At the international as well as the national level in many parts of the world, policy makers have become more aware of the importance of integrating gender issues into all development policies and plans.

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**Sex**

**Biological differences between women and men**
- Differences are fixed and unchangeable
- Differences do not change over time and between cultures

**Gender**

**Social relationship between women and men**
- Differences between women and men are shaped through the history of social relations
- Differences may be changed
- Women’s and men’s roles change over time and between cultures
Women in Development

The Women in Development (WID) Movement emerged in the early 1970s when it was first recognized that development efforts had not benefited women as much as men. The term WID was first introduced by a network of women professionals working for international development, on the basis of the pioneering work of Ester Boserup. She demonstrated that changes introduced by development and modernization had a different effect on women and men and that often development projects had negatively affected women.2

Policy makers and researchers began to see women not just as mothers whose only role in society is childbearing and rearing, but also as economic agents, in charge of key aspects of production. Different policy approaches were adopted by international agencies and governments, showing an increased recognition of the different roles of women and men in development and the importance of many aspects of women’s lives that had remained invisible until then.

The original Women in Development approach, the equity approach, introduced during the United Nations Women’s Decade (1976-1985), saw women as active participants in development and considered measures aimed at achieving equity for women in the development process. Policies relied on the ability of women to replace ‘paid’ services – eliminated by stabilization and adjustment policies – with their unpaid work. Policies were based on the assumption that women were underutilized as human resources and needed to be integrated into the development process. Increasing women’s economic participation would bring about equity, the efficiency approach.

More recently, based on the writing and experience of women and grassroots organizations in developing countries, the emphasis has been placed on increasing the capacity of women to improve their own strength and self-reliance. This originated the empowerment approach. Although recognizing existing inequalities between women and men, less attention is focused on women as a homogeneous group and more attention paid to their different conditions depending on their race, class, colonial history and current position in the economic order.4

<table>
<thead>
<tr>
<th>1. Equity approach</th>
<th>3. Efficiency approach</th>
<th>4. Empowerment approach</th>
</tr>
</thead>
<tbody>
<tr>
<td>The original WID approach: most popular 1975-85</td>
<td>Third and predominant approach: 1980s onward</td>
<td>Most recent approach: 1975 onward, more common after 1980s</td>
</tr>
<tr>
<td>• to achieve equity for women in the development process</td>
<td>• to integrate women into development so that development is more efficient</td>
<td>• to empower women through greater self-reliance</td>
</tr>
<tr>
<td>• to give women political and economic autonomy</td>
<td>• rely on women to replace declining social services</td>
<td>• meet strategic gender needs through bottom-up mobilisation around practical gender needs</td>
</tr>
</tbody>
</table>

2. Anti-poverty approach
Second WID approach: 1970s onward

• to increase productivity of poor women
• to allow women to earn an income

Source: Adapted from Caroline O.N.Moser, Gender Planning and Development. Theory, Practice and Training, Routledge, London and New York, 1993, pp.56-57.
Gender and Development

The original idea of the WID movement is still valid. Studies continue to demonstrate that women and men do not benefit equally from development. However, over the years, the focus has shifted from women in isolation to a more comprehensive view of women and men and their interrelationships.

WID strategies are based on the idea of integrating women into development without questioning what development and without recognizing that women have always been part of the development process. Also, women are seen as a homogeneous group without any differences in social and economic conditions. Women specific projects have often failed or have perpetuated the isolation and segregation of women in specific sectors of the economy. Women’s projects have generally been small, underfunded and marginal with respect to the mainstreaming of overall economic planning. Micro-level, income-generating programmes for women have often provided only insufficient income and contributed to women’s marginalization from mainstream economic production. The creation of WID offices and bureaux isolated from the overall policy and decision making mechanisms have also contributed to a certain extent to the marginalization of women’s concerns.

Based on the recognition that isolating women’s concerns from mainstream development policies and strategies has not worked, the focus shifted from women to gender. The basic idea was first stated by Ann Whitehead, in 1978: ‘no study of women and development can start from the viewpoint that the problem is women, but rather men and women, and more specifically the relationship between them’.

It is now widely recognized that macro-economic policies have a greater effect on women than WID programmes and projects. With the Gender and Development approach (GAD), changes concern the whole social system and all existing structure to ensure a more equitable development for both women and men.

Gender analysis looks at women in relation to men and their economic and social conditions. It studies the interrelationships between women and men within the overall interrelationships among socio-economic groups. While the WID approach tends to marginalize women, Gender and Development is a global approach that looks at the whole society and allows the full realization of women’s and men’s potentials.

International agencies and governments place more attention on the role and responsibility of men in bringing about gender equality. At the 1994 International Conference on Population and Development, governments recognized that ‘the empowerment and improvement of (women’s) status are important ends in themselves and are essential for the achievement of sustainable development’, also stated that ‘men play a key role in bringing about gender equality’.

GAD looks at both women’s and men’s economic and social roles and their interrelations, in different socio-economic groups.

GAD concerns the whole social system, the impact of macro-economic policies on men and women and projects for both women and men.
Milestones in achievement of equality

1946 Establishment of the Commission on the Status of Women
The Commission on the Status of Women, a functional commission of the Economic and Social Council of the United Nations, meets annually and has the mandate to promote women’s rights and monitor the situation of women in the world.

1952 Adoption of the Convention on the Political Rights of Women
The first legal instrument, the Convention on the Political Rights of Women, was adopted by the General Assembly to deal with women’s rights to vote and hold and exercise public functions.

1957 Adoption of the Convention on the Nationality of Married Women
This Convention initiated work on equality in the right to nationality of married women.

1962 Adoption of the Convention on Consent to Marriage, Minimum Age for Marriage and Registration of Marriages
This Convention initiated work on equality in marriage and dissolution of marriage.

1967 Declaration on the Elimination of Discrimination against Women
The first global instrument, covering all spheres of society and family life, was the adoption by the general Assembly of the Declaration on the Elimination of Discrimination against Women.

1975 International Women’s Year and first International Conference on Women, Mexico City
The General Assembly proclaimed 1975 the International Women’s Year and at the historic conference in Mexico City women and men from all over the world adopted the World Plan of Action for the Implementation of the Objectives of the International Women’s Year.


1979 Adoption of the Convention on the Elimination of All Forms of Discrimination against Women
The Convention establishes an international bill of rights for women, with the purpose of ending discrimination that denies or limits women’s equality in the political, social, economic, cultural and civic life.

1980 Second World Conference on Women, Copenhagen
A second World Conference on Women was convened in Copenhagen, to evaluate the progress achieved during the decade. The Conference adopted a Plan of Action with emphasis on employment, health and education and urged agencies to prepare data and analysis on the situation of women in the world.

1985 Third World Conference on Women, to Review and Appraise the Achievements of the United Nations Decade for Women, Nairobi
At the conclusion of the Decade, a World Conference to Review and Appraise the Achievements of the United Nations decade for Women was held in Nairobi. Thousands of women and men from 157 countries gathered together. Governments approved a document – the Nairobi Forward-Looking Strategies for the Advancement of Women to the year 2000 – that since then has been the basis for the work to achieve equality between women and men and to address women’s issues. Emerging areas of concern were also addressed by the Nairobi Strategies: the economic value of underpaid work by women; the need for women to play a larger role in decision making; violence against women; the need for timely and accurate statistics on women.

1993 World Conference on Human Rights, Vienna
1994 International Conference on Population and Development, Cairo
1995 World Summit for Social Development, Copenhagen
Since 1985, a more global approach has gained favour among international agencies and Governments which incorporates gender issues in global policy and decision making. World Conferences on various subjects have brought gender issues at the top of the agenda, recognizing that changes and development of the whole society can only take place by adequately considering women’s and men’s interrelationships in society and empowerment of women.

1995 Fourth World Conference on Women, Beijing
Regular monitoring of the implementation of the Strategies was conducted by the Commission on the Status of Women. The work culminated in the Fourth World Conference on Women, held in Beijing in September 1995.
Gender Issues Worldwide

Decision making

Women and men do not participate equally in political decision making. Almost everywhere women have the right to vote, but only in 22 countries does the representation of women in parliaments exceed 20 per cent of the total and only in 6 countries is this percentage higher than 30. In the Nordic countries, a growing participation of women in the labour market and in the public sphere in general has contributed to a more even distribution of women and men in parliament – in 1994, 40 per cent of parliamentarians in Sweden were women.

In governments, the presence of women in top positions in key areas – defence, economic policy and political affairs – is scarce. Even in those ministries where women are better represented – education, culture, social welfare and women’s affairs – the percentage is still very low. In 1994, 59 countries had no women ministers. With the exception of only 16 countries, women ministers are fewer than 15 per cent of the total. And women are only slightly better represented at subministerial level: only in 30 countries the percentage of women is equal or over 10 per cent.

By contrast, women play an important role at community and grass-roots levels. In many countries they are very active in peace and environmental movements and organize themselves in groups for income generating activities and various forms of training and assistance.

Sex based differences exist also in economic decision making. Women rarely achieve top positions in finance ministries and central banks and are a small percentage of administrative and managerial workers.

Women’s and men’s roles also differ in the decision making in the household on important subjects such as family size, allocation of resources and education and work opportunities for their children.

Economic life

Women and men have different responsibilities, perform different activities, hold different jobs and often have different pay. In the working world of women, family and work are strictly interrelated, while for men, work often coincides with a paid job regulated by fixed schedules, outside the house. Women in industrial societies generally hold a paid occupation outside the house, but still have most of the responsibility for the care of the family and the house. In agricultural societies, women work in the field to grow food, and manage all the other activities directly related to the well being and survival of the family, while men are more often engaged in cash crop production, where work is regulated and market oriented.

Because of the large amount of time devoted to household activities, women have problems combining responsibilities for the household and children with paid employment. They remain excluded from training programmes, lag behind men in career advancement and have little time for political and social participation.

Many of the activities performed by women are unpaid and most of this unpaid work is excluded in the accounting of the national product. Important activities for the survival of the population and for the lives of women and men such as carrying water, or growing food for the family are very difficult to measure, while housework, such as child care and meal preparation, falls outside the

| Only in six countries women represent more than 30 per cent of parliamentarians, 1994 |
|-----------------|-----|
| Sweden          | 40  |
| Finland         | 39  |
| Norway          | 39  |
| Saint Lucia     | 36  |
| Denmark         | 33  |
| Netherlands     | 31  |

See Further reading for full citation.
Women and men hold different occupations, have different career opportunities and salaries and work a different number of hours.

Women and men generally work in different sectors. For instance, in industrial countries women are far more likely than men to work in the service sector, while the male labour force is more equally distributed between industry and services. In the Latin American region more than three quarters of women are in the service sector, while the male labour force is more evenly spread among the three sectors.11

**Agriculture**

A large number of women in the world work in agriculture. In two of the most populated regions – Sub-Saharan Africa and Southern Asia – the large majority of women work in this sector.12 The contribution of women to agricultural production and their situation in rural areas are crucial issues in the formulation of development policies. Rural women are often poor and mostly work to produce food for the household rather than benefiting from crop sales. They have limited access to productive resources and do not benefit equally with men from training and information programmes and from labour-saving technology that increases productivity and profit. Because of legal and social barriers, they often do not have access to land, which reduces even more their chances to be contacted by agricultural extensionists and to be granted credit. Moreover, even if women perform much of the farm work and make many of the decisions in the holding, agricultural extension services are often designed for men and do not consider women’s specific conditions and needs.

One important reason why women are excluded from productive resources and training is their invisibility. The work women do in agriculture is largely underestimated. Their work is for a large part ‘unpaid work’ in the family enterprise, work for ‘subsistence production’, part-time or seasonal, all of which are difficult to be captured by official statistics and often regarded by both the enumerators and the interviewed as ‘housework’. Problems of undercounting affect women in particular. They have repercussions on policies and measures concerning women and men, and contribute to perpetuate the scarce access of women to resources, education and training.
Inequality in the labour market
Even where women have secured their position in the labour market, they still do not work side by side with men. They hold different occupations, have different career opportunities and salaries, and work a different number of hours. They are more often employed in clerical and service jobs and less in transportation and manufacturing jobs. And within the same occupational group they always cover the less prestigious and worse paid positions. In many countries, occupations such as nurses, typists and stenographers, secretaries, maids and shop cashiers – traditionally the least paid and least prestigious – are 97–100 per cent female.13

Almost everywhere, women are worse paid than men for the same kinds of work and face serious obstacles in advancing their careers. There are still legal barriers that prevent women from fully participating in the labour market. And where there are no legal barriers, many employers are reluctant to hire and train women and to assign them to high level positions, because of prejudices, cultural barriers, customs or other taboos. Moreover, lack of childcare and unequal sharing with men of household responsibilities, limit women’s work outside home and limit their access to higher positions and higher-paid jobs. Even in countries where maternity benefits and childcare exist, women often face discrimination from employers who do not want to hire women fearing that they will be absent from work after childbirth and when the children are sick. Some countries have advanced significantly in the achievement of equality by providing parental leave to both women and men, allowing a more equal sharing of parental responsibilities and more equal opportunities in paid work. In Sweden, one month of the cash benefit after the birth of a child must be used by the father (‘daddy-month’) while the remaining 390 days can be used by either parent.14

In managerial and administrative positions, although the proportion of women has shown some increase, men still largely predominate. Only in six countries, women and men share almost equally these jobs – around 40 per cent of administrative and managerial workers are women. In the rest of the world, men represent the large majority in these positions and often the totality.15

The informal sector
In many countries, as a result of scarce access to wage employment, women have sought opportunities in the informal sector. In the informal sector, work is far less secure and in general pays less than the minimum wage. Low levels of organization and technology, poor economies of scale and scarce access to large markets and marketing constrain productivity and returns.

Because of the nature itself of the informal sector, the lack of record-keeping by workers and the fact that the workplace is often located in the home participation in the informal sector is very difficult to measure. Few countries regularly collect statistics on the informal sector and employment in this sector is underestimated by official...
statistics. However, several studies show that the informal sector represents a significant share of total production, especially in Africa and especially in the service sector. There are often more women than men in the informal sector, even in countries where the global participation of women in the labour force is low.

**Poverty**

Many countries face increasing difficulties in achieving sustainable development and improving the quality of life of their populations. Poverty remains the major problem. It is estimated that globally 1 billion people live in poverty, and the number continues to rise.\(^{16}\)

Economic and social effects of debts, of trade imbalances and the slow down in the world economy fall on a pre-existing system of inequality between women and men. The different effects on the economic and social conditions of women and men are hard to measure. However, women are often disadvantaged because of lower education and fewer remunerated jobs. Poverty exacerbates gender inequalities falling disproportionately on women.

Many women have lost their jobs in the public sector, which has been deeply affected by cuts in government spending. In agriculture, incentives have benefited cash crops more than food crops for subsistence and local markets, which predominate in the poorest areas of countries and in which women are the main producers. As mothers and caretakers, women have seen their burden increase because of reductions in social services and subsidies. Declining household income and the need to replace social services with unpaid work have thus increased women’s working hours.

**Unemployment and underemployment**

Because women and men work in different sectors, hold different occupations and are affected in different ways by family responsibilities, they are affected by unemployment at different levels and at different stages in their working life.

In situations of poverty, few workers are covered by unemployment insurance or other public relief schemes and very few people can afford to be unemployed. They must do some work, however little or inadequate and seek at the same time additional work. This is particularly true for women, who more often than men do unpaid work in the household, grow food in the family plot, or work as seasonal agricultural workers. According to the standard definition of economic activity, these women are economically active, and should be counted as ‘employed’, although their income, utilization of skills and productivity are low and more similar to a situation of unemployment (underemployment). There is a large range of situations from total lack of work to full employment that needs to be measured and addressed by policy measures.

Underemployment has growing relevance in industrialized countries as well. The economic crisis of the last decade in these countries has increasingly generated a multitude of small jobs (‘petits boulots’), irregular activities similar to those of the informal sector of the developing countries and precarious jobs, many of which can be regarded as underemployment.

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**Beijing Declaration on Poverty**

Governments participating in the Fourth World Conference on Women in Beijing, agreed that: ‘Eradication of poverty based on sustained economic growth, social development, environmental protection and social justice requires the involvement of women in economic and social development and equal opportunities and the full and equal participation of women and men as agents and beneficiaries of people-centred sustainable development.’

Family and household

Women and men have different roles within the family. Women traditionally have the primary responsibility for managing and budgeting household consumption, especially for basic needs. They give birth and take the main responsibility for their children, as well as for the welfare of the elderly, sick and other members of the family. These responsibilities are seldom shared with their husbands, even when women are also employed outside the household. By contrast, men are traditionally seen as the bread winner in the family and are only marginally involved in the care of the children and housework.

Women and men also follow different patterns in the formation and dissolution of the family. They marry at different ages – usually women at a much younger age than men – and when they separate or divorce they choose very different living arrangements.

Female headed households

A considerable number of households are headed by women. Because of the definitions and criteria usually adopted in censuses and surveys, a female headed household is such only when there is no adult male present. For this reason, female headed households are often households where the husband has migrated or is not permanently resident with the family for other reasons – polygynous or visiting unions – or widows living alone. These situations are increasingly frequent as dissolution of marriage is more common, male migration is on the rise where employment opportunities are scarce, and more women are widows, as women live longer and marry younger, and populations are ageing.

Women headed households are most common in the Caribbean – 35 per cent of all households – while in all other regions approximately one in four or one in five households are headed by a woman.17

The needs and characteristics of female headed households are important in policy formulation, especially because there is evidence that they provide their children with better nutrition and education despite that they are more likely to be vulnerable to poverty.

Marital status by age group in China 1990

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<tr>
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<tr>
<td>Never married</td>
<td>95 98</td>
<td>63 83</td>
<td>25 48</td>
<td>4 17</td>
<td>1 7</td>
<td>.. 6</td>
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</tr>
<tr>
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<td>37 17</td>
<td>74 52</td>
<td>95 82</td>
<td>99 91</td>
<td>98 92</td>
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</tr>
<tr>
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<tr>
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<tr>
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<td>100 100</td>
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<tr>
<td>Number (Million)</td>
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<td>26 27</td>
<td>35 37</td>
<td>51 54</td>
<td>40 44</td>
<td>42 45</td>
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<table>
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<th>45–49</th>
<th>50–54</th>
<th>55–59</th>
<th>60–64</th>
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<tr>
<td>Never married</td>
<td>.. 5</td>
<td>.. 5</td>
<td>.. 5</td>
<td>.. 4</td>
<td>.. 3</td>
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<tr>
<td>Married</td>
<td>97 92</td>
<td>95 91</td>
<td>90 89</td>
<td>82 87</td>
<td>70 83</td>
<td>37 67</td>
<td></td>
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<tr>
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<td>.. 1</td>
<td>1 10</td>
<td>2 ..</td>
<td>.. 2</td>
<td>.. 2</td>
<td>.. 1</td>
</tr>
<tr>
<td>Widowed</td>
<td>2 2</td>
<td>5 3</td>
<td>.. 5</td>
<td>17 8</td>
<td>29 13</td>
<td>62 30</td>
<td></td>
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<tr>
<td>Total</td>
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<td></td>
</tr>
<tr>
<td>Number (Million)</td>
<td>30 33</td>
<td>23 26</td>
<td>22 24</td>
<td>20 22</td>
<td>16 17</td>
<td>34 29</td>
<td></td>
</tr>
</tbody>
</table>

Early pregnancy and a large number of children limit women’s opportunities in life.

Household size and composition
With the exception of some parts of Asia and Northern Africa, in all the regions of the world, households are getting smaller. Women are having fewer children and at older ages, and increasingly they become widows and live alone the last years of their life. There are more single-parent families and people living alone and fewer multigenerational households. The proportion of divorced couples has increased in many countries and, in some countries, there is some indication that women are less likely than men to enter a new relationship. This contributes to the high number of women who remain alone to care for their families. In 23 countries, there is more than one divorce for every four marriages and in Sweden and the United States divorce occurs as often as one for every two marriages.\(^{18}\)

Childbearing
The number of children women will have during their lives and the ages they become mothers for the first time deeply affect their education and employment opportunities, their health and the health of their children and their family life. In Sub-Saharan Africa, women are estimated to have an average of 6.1 children during their lives, and in Southern Asia, despite a sharp decrease between 1970 and 1990, 4.8.

In many countries women still marry very young and have children over a long childbearing span. In Zambia, Uganda and Niger, 70 per cent or more women have given birth before age 20.\(^ {19}\) A survey in Bangladesh found that 73 per cent of women had married by age 15 and 82 per cent by age 16.\(^ {20}\) For a woman marrying young means that with high probability she will be in subordinate position to her husband, who is often many years older, and widowed very soon. Pregnancy at a young age represents a serious risk for the health of the mother and the child. Teenagers who become mothers lose their already low chance of further education and accessing training and opportunities of a paid employment.

In other countries, women start to have children at a much older age and age at first marriage and first birth is continuously increasing. In these countries, the number of children per woman is often below the replacement level. Policy concern is about a slow or negative population growth and policies and measures are intended to provide women and men with better means to balance labour force participation and parental responsibilities.

Family size preferences
Modern methods of family planning help women achieve the family size they desire, better plan their lives and assume an expanded role in society. The use of modern family planning is spreading, although the availability of contraceptives is sometimes limited,
especially for younger and unmarried women or in rural areas. It is estimated that in 1994, 57 per cent of couples in the world used some form of contraceptives. Use varies widely in different parts of the world – from 79 per cent of couples in Eastern Asia and 72 in the developed regions to 18 per cent in Africa.

The availability of contraceptives is only one of the many factors that directly or indirectly contribute to determine family size. Education and work are critical in determining the number of children a woman will have during her life. Some years of education and paid employment significantly reduce fertility.

### Total fertility rate 1990–1995

<table>
<thead>
<tr>
<th>Region</th>
<th>Total Fertility Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Developed regions</td>
<td></td>
</tr>
<tr>
<td>Western Europe and other</td>
<td>1.8</td>
</tr>
<tr>
<td>developed</td>
<td></td>
</tr>
<tr>
<td>Eastern Europe</td>
<td>2.1</td>
</tr>
<tr>
<td>Africa</td>
<td></td>
</tr>
<tr>
<td>Northern Africa</td>
<td>4.6</td>
</tr>
<tr>
<td>Sub-Saharan Africa</td>
<td>6.1</td>
</tr>
<tr>
<td>Latin America and Caribbean</td>
<td></td>
</tr>
<tr>
<td>Caribbean</td>
<td>2.7</td>
</tr>
<tr>
<td>South America</td>
<td>3.1</td>
</tr>
<tr>
<td>Central America</td>
<td>4.2</td>
</tr>
<tr>
<td>Asia and Pacific</td>
<td></td>
</tr>
<tr>
<td>Eastern Asia</td>
<td>2.3</td>
</tr>
<tr>
<td>South-eastern Asia</td>
<td>3.8</td>
</tr>
<tr>
<td>Central Asia</td>
<td>4.0</td>
</tr>
<tr>
<td>Western Asia</td>
<td>4.3</td>
</tr>
<tr>
<td>Oceania</td>
<td>4.3</td>
</tr>
<tr>
<td>Southern Asia</td>
<td>5.3</td>
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</tbody>
</table>


Decisions on the number and spacing of births are made within the family. Policy makers have become more aware of the importance of changing men’s attitude in these decisions and making them more involved in sharing parental responsibilities. One of the objectives of the Programme of Action of the 1994 World Population Conference is to promote gender equality in all spheres of life, including family and community life, and to encourage and enable men to take responsibility for their sexual and reproductive behaviour and their social and family roles.  

**The elderly**

As a result of decreasing fertility and higher life expectancy, the population in the world is ageing. In many countries, women aged 60 years and over are already one quarter of the total. In other countries, the proportion of elderly people is still low – in Sub-Saharan Africa only 5 per cent of women and men are 60 years or older – but it is increasing rapidly, because of continuing decline in fertility and improvement in life expectancy. Countries which have undergone a rapid fertility transition in the recent past are ageing the fastest compared to countries where the transition proceeded at a more moderate pace.

Among the elderly, the proportion of those ‘very old’ (80 years and older) is increasing fast. The social and economic implications of an increasing population of ‘very old’ are important. While the younger groups of elderly people may be economically active and able to support themselves, the ‘very old’ are more likely to be totally dependent on others and in need for social and health care. They have to rely on the support of other family members or on public social security systems where these exist.

An ageing society contains more women than men. Women live longer than men and at older ages they largely outnumber men in most countries. Many of them are widows, often living alone and with very little support from society. The majority of men in general live the last part of their lives with their wives and even when widowed, they often have easier conditions, because of better treatment in terms of social security and support from society.

An increasing number of elderly people pose a serious strain on social and health services and on pension schemes. Because the elderly include more women than men, and will continue to do so in most countries, the adjustment in services must be particularly sensitive to the needs of elderly...
women. In countries where public expenditures for social services and social security are limited, old people rely on the support of the extended family. Modernization, urbanization, the decline of the extended household and increasing participation of women in the paid employment outside home have significantly diminished the efficiency of this informal system. For women the problem is greater especially when they have no children. Many elderly women are widows and often, because of cultural and traditional norms and laws, have no access to land, to inheritance and to credit.

In Africa and Asia, 50 per cent of women aged 60 and over are widows. Though these women will have done their share both as producers and as mothers and caretakers, they will most likely receive no support in old age.

In countries with large populations and limited resources, it is crucial to examine the absolute increase in the number of elderly. This way of examining population ageing is the most relevant to policy planners and service providers.

**Laws**

Many of the inequalities between women and men in society and within the family are embodied in laws. There are countries where married women cannot be regularly employed, open a bank account or request a loan without the authorization of their husbands or where widows have no rights over the inheritance and are expelled from their land by their in-law’s and relatives. In others, laws prohibit women from owning houses. Many agrarian reform laws exclude women: land is awarded to the head of the family, only when this is a man. Some societies even deny women equal rights with men to marry and divorce. And even where laws guarantee equality sometimes rooted traditions and customary norms perpetrate discrimination against women.

**WOMEN AND THE LAW**

Mexico

‘The wife is generally in charge of work to be done at home. She may exercise employment, profession or business, if same does not interfere with her household duties’.

Panama

‘The husband may remarry immediately after recording the degree of divorce in the civil registry. The wife may not remarry until 300 days after date of separation as determined by the court’.

Chile

‘The husband is chief of the marriage partnership...’

Egypt

The law ‘forbids a woman from being a judge or a general prosecutor’.

India

‘Any Muslim of sound mind who has attained puberty may divorce his wife whenever he desires, without assigning any cause’.

Pakistan

‘A daughter is entitled to half the inheritance that a son gets when the parents die’.

\[1\] Adapted from C. Murphy, Lowering the veil, The Washington Post, February 17, 1993
Health

Women’s and men’s concerns about health differ substantially for biological and socio-economic reasons. Factors such as dietary habits, working environment, stress, smoking, and use of alcohol and drugs all influence the state of health of individuals. Women and men have different occupations and roles in society and therefore different life styles and health related needs. Other factors influence women’s and men’s exposure to diseases, the way they seek care and treatment and their access to health services. These might be social and cultural norms that affect nutrition and life style, as well as economic factors that affect the quality of life and access to health care. Many of the diseases and health risks women are exposed to are related to their reproductive function and others are exacerbated by pregnancy.

Life expectancy, diseases and causes of death

Women live in general longer than men. Differences between women’s and men’s life expectancy are as high as 10–12 years in some countries in Eastern Europe. Women also die of different causes. In developed countries, before age 65 the leading cause of death is generally cancer for women and heart disease for men. After age 65, heart disease becomes the leading cause of death for both sexes and death rates from hearth diseases become higher among women than among men. Also, when women have heart disease they are almost twice as likely as men to die after the heart attack. However, research has always focused mainly on the determinants of heart diseases in men, who were thought to be the only ones at risk. Only recently, researchers have begun to investigate risk factors for women and to look into ways to protect them and help prevent the disease.

Another evident sex differential occurs in deaths due to injuries and poisonings. Virtually every country reports higher proportional mortality for males due to these causes, especially at the younger adult ages.

In countries where deaths are not regularly coded, it is more difficult to assess gender differentials. In these countries a large number of deaths is due to communicable diseases. Estimates show that also in these countries, the largest gender differences are in deaths for heart diseases and violence and injuries.
Health of children
In poorer countries, women’s state of health is more closely linked to social and cultural practices, and to childbearing. In countries where son’s preference is strong, girls are treated with less care, more likely to be fed less nutrient foods and rarely taken to the hospital when sick.

In many societies girls are valued less than boys and are regarded as a burden to the family. Data from China, Korea and India show that the sex ratio at birth is far from the norm of about 106 boys per 100 girls. And at higher order births, the number of boys over girls is even higher.\(^2^4\) This is certainly an indication that the birth of a girl in many families is much less desirable than that of a boy. Where early sex detection is available, sex selective abortions are used to limit the births of female babies. Some families give baby girls away for adoption and in some cases, especially where families try to limit the number of children, baby girls are killed.

In countries where civil registration is accurate, trend analysis shows that girls have a “biological” advantage over boys, especially during the first year of life, when mortality is highest. Where civil registration is not reliable, data on infant and child mortality are available only from censuses and surveys and data by sex are scarce. More information and analysis on infant and child mortality is needed especially in countries where boys are preferred and girls discriminated against.

In many countries, women’s health and lives are still seriously threatened by customs and traditional practices. In parts of Africa and Asia, genital mutilation is still widely practiced with dramatic consequences on the physical and psychological health of the woman.

Anaemia
Anaemia also affects women and men differently, especially because in women it is exacerbated by pregnancy. Malnutrition is the main cause of anaemia. Among pregnant women more than half are clinically anaemic in Africa, in the Caribbean and in Western and South-eastern Asia, and three-quarters in Southern Asia and Oceania.\(^2^5\) Poor nutrition and anaemia during pregnancy increase the risk of maternal morbidity and mortality.

Reproductive health
Maternal mortality is still a major cause of death for women in many countries. One in 23 women in Africa will die from a cause related to pregnancy and childbearing. Maternal mortality ratios vary enormously between developed and developing regions: from 26 deaths per 100,000 live births in the developed regions to 690 in Sub-Saharan Africa.\(^2^6\) Maternal mortality varies also within developed regions: from 3 in Belgium to 83 in Romania.\(^2^7\) There are four main clinical causes of maternal death. The most common is haemorrhage, where the woman bleeds to death after the delivery. The other causes are eclampsia – a metabolic shock during the last stage of pregnancy – infections and obstructed labour. The high risks of childbearing are linked to the lack of trained personnel, health services, malnutrition and most important, the lack of adequate emergency care. Childbearing is particularly dangerous for teenage mothers.

A large number of maternal deaths is due to unsafe abortions. It is estimated that each year, 20 million unsafe abortions are performed and result in the deaths of 70,000 women.\(^2^8\)
### Maternal mortality 1988

<table>
<thead>
<tr>
<th>Region</th>
<th>Maternal deaths (1,000's)</th>
<th>Maternal mortality (per 100,000 live births)</th>
</tr>
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<tbody>
<tr>
<td>Developed regions</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Africa</td>
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<td>Oceania</td>
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<td>600</td>
</tr>
<tr>
<td>Total</td>
<td>509</td>
<td></td>
</tr>
</tbody>
</table>


RTIs and STDs
Most reproductive tract infections (RTIs) are sexually transmitted (STDs). Some STDs also include systemic diseases such as AIDS. Women are generally more susceptible to these diseases than men and more likely to be asymptomatic. RTIs can cause ectopic pregnancy (outside the uterus), pelvic inflammatory disease, pelvic pain, a higher risk of contracting HIV, a higher risk of cervical cancer and miscarriage, stillbirth and foetal death. The most serious consequence of RTIs is infertility. Between 15 and 25 per cent of women who contract pelvic inflammatory disease will be permanently infertile.

AIDS
At the beginning of the AIDS pandemic most cases were among men – mainly homosexuals and I.V.-drug users. Today the number of women contracting HIV is growing faster than the number of men. WHO estimates that in 1994 the global number of HIV infections was over 16 million and that 40 per cent of these were women. The way and level of risk of contracting HIV are different in women and men and in different age groups of the population. Different are also the specific preventive measures needed and clinical manifestations.

Providers of health care
Most of the ‘informal’ health care and assistance to children, the sick and the elderly is provided by women. Differences also exist in formal health care – for example, there are often more men doctors and more women nurses.
Men are more often than women victims of crime and violence. Women are often attacked by men within their own families.

Forced prostitution is the result of economic degradation and economic dependency on men. Often, these involuntary prostitutes have fallen into a network of trafficking due to promises of jobs in the cities or positions as domestic servants. Orphans, women abandoned by their families, young impressionable girls from poor villages or urban streets are the more likely to fall into the hands of traffickers. They are sold and forced into prostitution and very few manage to escape. The attempts to rehabilitate women who have been forced into prostitution seldom work, since they are not accepted back into their families.

**Violence**

Men are more often than women victims of crimes, homicides and street violence. They are usually attacked by strangers or occasional acquaintances. Women, by contrast, are usually attacked by people they know and most often by men within their own families.

Official figures on violence against women are very scarce, as violence tends to be unreported especially when it is perpetrated within the family. But small scale studies show that the phenomenon is widespread.\(^{32}\) Beating, rape, psychological torture and deprivation of basic needs exist in all regions, classes and cultures. Sexual abuse may occur at any age, but studies show that an alarming proportion of victims of rape and incest are young girls. Sexual assault and rape can lead to unwanted pregnancy, miscarriage, infection, and depression. Psychological consequences of violence can be so serious as to lead to suicide.\(^{32}\)

Forced prostitution is another form of violence against women. Young girls are forced into prostitution, sold to brothel owners, tricked into working as prostitutes by false promises of remunerative jobs. Many of these women are very young. The Commission on Human Rights working Group on Contemporary Forms of Slavery cites estimates of 2 million women in prostitution in India, of whom 400,000 are girls under 18.\(^{33}\)

Women in selected large cities who were sexually assaulted\(^1\) in a five-year period 1987–1992

<table>
<thead>
<tr>
<th>Region</th>
<th>City</th>
<th>Proportion (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Europe</td>
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</tr>
<tr>
<td></td>
<td>Russian Federation, Moscow</td>
<td>6</td>
</tr>
<tr>
<td>Africa</td>
<td>South Africa, Johannesburg</td>
<td>4</td>
</tr>
<tr>
<td></td>
<td>Tunisia, Tunis</td>
<td>6</td>
</tr>
<tr>
<td></td>
<td>Egypt, Cairo</td>
<td>8</td>
</tr>
<tr>
<td></td>
<td>United Rep. of Tanzania, Dar es Salaam</td>
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<td></td>
<td>Uganda, Kampala</td>
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<tr>
<td>Latin America and Caribbean</td>
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<td>Brazil, Rio de Janeiro</td>
<td>10</td>
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<td></td>
<td>Argentina, Buenos Aires</td>
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<td>India, Bombay</td>
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<td>Indonesia(^3)</td>
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<td>Papua New Guinea(^4)</td>
<td>14</td>
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</table>

\(^1\) ‘Sexual assault’ includes rape, attempted rape and indecent assault. Data were derived from an international crime survey that focused on ‘stranger’ crimes such as burglary, car theft and muggings. Estimates are unlikely to include sexual assaults by intimates or family members.

\(^2\) Survey was carried out on a national level.

\(^3\) Survey includes eight cities.

\(^4\) Survey includes three cities: Port Moresby, Lae and Goroka.

Education

Education significantly affects women’s and men’s opportunities in life. Education opens doors to employment, earnings, career and social advancement. It also influences the health of individuals and their families and their participation in community life. There is also a strong relationship between the level of education and age at marriage and number of children.

Everywhere in the world, women and men receive different education, in terms of number of years and subjects studied.

In some countries, government expenditure for education, as for health, has been cut, with a consequent shortage of educational facilities. Also expenditure cuts have shifted the burden from the government to the family, with increased costs for school related necessities and the introduction of tuition fees. As a result, many countries in the 1980s have seen enrollment rates fall. And where resources are limited, families tend to give preference to boys, reducing even further opportunities for girls.

Illiteracy

Despite a significant progress towards literacy, illiteracy rates are still higher for women than for men, especially in countries where illiteracy is high. In the age group 15–24, female illiteracy rates are typically 25 percentage points higher than among men. Illiteracy rates are particularly high for rural women – some rural rates are two or three times higher than urban rates.34

The high proportion of illiterate women reflects a huge historical deficit in the education of women, but also a scarce access of women to today’s education and literacy programmes. Other factors limit girls’ educations, such as cultural and social norms and the fact that girls are needed at home to perform household chores.

Dropouts

A large number of girls drop out from school. Several factors are responsible for the high incidence of dropouts among girl students: reluctance of parents to send girls to distant schools, lack of women teachers, lack of financial resources, etc. In countries where adolescent childbearing is very common, many girls drop out when they become pregnant.

Fields of study

Girls and boys follow different paths also in the choice of fields of study, whether at high school, university or other institutes of higher education. There are fields – such as agriculture, forestry and fishing, science and engineering – generally dominated by men and others – liberal arts, social science and education – where women’s enrollment has increased to the point that in many countries it is higher than men’s.

Gender segregation in education perpetuates segregation in employment. And where women, because of traditions, stereotypes or family constraints, have scarce access to technical and
scientific education, they will continue to be excluded from these areas in the labour market.

**Training programmes**

Adult women and men have different access to training. Women have in general more responsibilities than men in the household and are often full time occupied with household chores and caring for children. This leaves them with very little time for attending training programmes. In addition, cultural and social barriers often prevent them from participating in training programmes which are formulated and organized taking in consideration men’s needs more than women’s.

**Teachers**

Teaching has traditionally been a profession open to women. In most of Europe, North America and Latin America, women are far more numerous then men in primary schools. Even in countries where women have scarce employment opportunities, their number is significant in first level teaching. However, the percentage of female teachers decreases enormously at the higher levels of teaching.35

**Environment**

Women and men participate in different ways in the use of natural resources and contribute at different levels both to environmental degradation and to environmental preservation and conservation. Failure in recognizing differences between women and men in their participation in the environmental process can jeopardize the success of projects and result in inappropriate interventions.

In developing countries, women are the main users of water in the household and are responsible for fetching water and fuel for heating and cooking. Because of their daily responsibilities, women are also more exposed to pollution from burning fuelwood, charcoal, crop residues or dung that produce carcinogens and cause eye and respiratory diseases.

Water is the most critical of all resources and its shortage imposes serious limits on human development. In Africa, by the year 2025, 21 countries for a total population of 1,100 million will face water stress or scarcity. This will constrain development in agriculture and in all other spheres of society.36

From 22 studies in African and Asian countries it emerged that women spend between 3.5 to 28 hours per week collecting water during in dry-season. Deforestation also affects women’s lives. In ‘high deforested’ areas in a region of India, women spend as much as five hours per day fetching fuelwood.37

Environmental degradation therefore has a differential effect on women and men. Women have to walk longer distances to fetch fuelwood and water. Policies need to take into account the costs of environmental damage, including the direct and indirect costs to women’s activities. Deforestation imposes a direct cost when fuelwood resources are depleted and must be purchased, and an indirect cost when women have to spend more time to fetch fuelwood.
In both industrialized and developing countries, use of chlorofluorocarbons, emissions of gases producing acid rain and city pollution, use of dangerous fertilizers all have contributed to environmental degradation. In urban areas, the environment is deteriorating quickly. Industrial pollution, pollution from motor vehicles, limited and contaminated water supplies, deficiencies in solid waste management and inadequate sanitation, sewerage and drainage affect poor people in particular. Poor people often establish their dwellings near hillsides, garbage dumps, swampy areas and other sources of industrial pollution that are unsuitable for human settlements. And women, who spend more time and perform more activities within the house than men, often suffer more from these situations.38

Many development projects exploit raw material, ignoring long term effects on natural resources and on people living on those resources and the different effect on women and men.

Although women and men are both affected by environmental degradation and perhaps women more than men, women’s participation in decision making on these issues is often limited. On the other hand, women have been active in grassroots movements and reforestation movements in many countries. Greater involvement of women in formulation and implementation of policies to reduce environmental degradation would probably result in improved measures and projects.

Men are not solely responsible for environmental degradation. All individuals are involved in the process, often associated with their struggle to survive, to exploit whatever natural resources are available. A better understanding of women’s exploitative land use and natural resource practices and how these differ from those of men is essential. Also, policy makers need to know more about women’s and men’s attitudes towards the environment and their uses of natural resources.

Population distribution, urbanisation and internal migration

The proportion of women and men is generally different in cities and in rural areas and varies among countries and regions. Traditionally women migrate shorter distances within a country, so that they are more often found in rural to rural migration and migration within the same province or state. Men, vice versa, are more often attracted to employment opportunities in cities. Measurements limited to migration between states or provinces are likely to under-report women’s level of migration. Also, women who move to engage in activities socially unaccepted or illegal – such as prostitution – and in domestic service are likely to be uncounted.39

These generalizations however hide very different national migration patterns. In the developed regions and Latin America the ratio of women to men is much higher in cities than in rural areas, while in all other regions, the opposite is true. One exception is Eastern Asia, where ratios in urban and rural areas are approximately the same.40

![Women per 100 men in countries’ four largest cities, 1990 census round](image)
The process of urbanization has important implications on the lives of women and men. Education and employment opportunities are usually better in cities and the urban environment is sometimes more favourable to a full realization of women’s potential. On the other hand, cities are growing fast, often with limited resources and consequently lack adequate housing, safe water and sanitation facilities. An increasing number of poor people in these cities live in slums, in shacks and shanty, in hastily developed favelas, in rented rooms, in illegal quarters or in shared quarters in boarding houses. In all cases overcrowded, cramped quarters increase the risk of transmitting diseases and expose people to all sorts of airborne and water related pathogens.

Refugees
During the last twenty-five years, the number of refugees in the world has increased enormously. The United Nations High Commission for Refugees estimated that the total number of refugees rose from 2.8 million in 1976 to 17.3 million in 1990 and 19 million in 1993. Refugees flee their countries because of political, ethnic or religious reasons and, in the case of women, also because of sex discrimination. They often flee from very poor countries and seek asylum in other poor countries that are not able to provide them with work and shelter.

It is estimated that among refugees there are nearly as many women as men. Little is known however about the size and structure of their households, whether they are female or male headed, their ages and other characteristics. Women refugees are often in a more difficult situation than men. They are subject to sexual abuse, discriminated in the delivery of assistance and they have special needs in terms of nutrition and health services especially linked to their reproductive health. Moreover, women do not participate equally with men in the administration of camps and in the formulation and implementation of assistance programmes.

Migration and displaced people
It is estimated that in the world there are about 106 million international migrants. Women represent 48 per cent of them. It is often assumed that women more often migrate as dependants of their husbands or relatives. However, little is known of the types of migrant flows and the extent of women’s and men’s participation in each of them. A better understanding of the different problems women and men face in the receiving country and the different determinants of their migration is essential to formulate adequate policies and measures in both the originating and the receiving country.
The Beijing Declaration and Platform for Action

The Beijing Declaration and Platform for Action were adopted in Beijing on 15 September 1995, by the Fourth World Conference on Women: Action for Equality, Development and Peace.

The Platform for Action is an agenda for the empowerment of women and aims at removing all obstacles to equality between women and men and to women’s active participation in all spheres of life. The Platform for Action builds on the Nairobi Forward-Looking Strategies and recognises the importance of the agreements reached by governments at the World Summit for Children, the United Nations Conference on Environment and Development, the World Conference on Human Rights, the International Conference on Population and Development and the World Summit for Social Development. These conferences set out specific objectives and strategies in various areas of concern in sustainable development and international cooperation and establish a new consensus on the important link between gender issues and sustainable development.

The Platform urges governments, the international community and civil society, including non-governmental organisations and the private sector, to take action on the following critical areas of concern:

- The persistent and increasing burden of poverty on women
- Inequalities and inadequacies in and unequal access to education and training
- Inequalities and inadequacies in and unequal access to health care and related services
- Violence against women
- The effects of armed or other kinds of conflict on women, including those living under foreign occupation
- Inequality in economic structures and policies, in all forms of productive activities and in access to resources
- Inequality between women and men in the sharing of power and decision making at all levels
- Insufficient mechanisms at all levels to promote the advancement of women
- Lack of respect for and inadequate promotion and protection of the human rights of women
- Stereotyping of women and inequality in women’s access to and participation in all communication systems, especially in the media
- Gender inequalities in the management of natural resources and in the safeguarding of the environment
- Persistent discrimination against and violation of the rights of girl child.
National issues, problems and goals

National plans for equal opportunities

In most countries today women’s and gender concerns are considered in development plans and policies. Some countries have formulated specific development plans for women, others have included a chapter on needs and problems related to gender or women’s issues in the national plan, others only mention some women’s concerns responding to pressure from women’s organizations or from development agencies. Many countries have set precise goals for full equality between women and men and have formulated strategies to achieve them. In the following a few examples are presented.

In Chile the National Service for Women, SERNAM, developed an Equal Opportunities Plan for Chilean Women 1994–1999. The plan is incorporated into the governmental programme by the president. It includes eight policy areas. For each area the current situation is diagnosed and specific goals and measures assigned to even relevant sectors of the State and even society as a whole. The policy areas are:

- Develop and apply constitutional, legal and juridical changes to defend equal rights for women and men.
- Facilitate equal opportunities for all forms of families and enable the generation of equal rights and opportunities for women and men therein.
- Foster equitable participation by women and men in educational processes and in the production and transmission of knowledge.
- Promote pluralistic and non-discriminatory images of women in culture and communications.
- Facilitate women’s access to and improve women’s position in the labour market.
- Improve the situation of women’s health.
- Create incentives for women’s social and political participation and their access to decision making.
- Strengthen public institutions for implementation, monitoring and evaluation of equal opportunity policies.

In Namibia, the First National Development Plan 1995/96–1999/2000 states that the government in both the medium and long term is to make optimal use of the country’s human resources to achieve the goal of socio-economic development. The general objectives are:

- Ensure full and equal integration of women in the development process at all levels.
- Achieve improved socio-economic conditions for women throughout the country and remove social and legal barriers that impede women’s full and equal participation in economic activities.
• Strengthen the Department of Women’s Affairs to enable it to effectively coordinate and guide the formulation and implementation of women’s development policies, programmes and projects.

• Heighten awareness on the needs, issues, concerns and roles of women in the process of development.

• Improve the collection, processing, analysis, dissemination and storage of statistical information on women’s activities, policies and programmes.

• Encourage and support women’s marketing efforts at community, regional and national levels.

• Support business-related training activities that are appropriate and accessible to women.

• Build the capacity of women to effectively advocate policies in the informal sector.

• Improve the standard of living and general welfare of women in rural areas.

In Sweden, the objective of equal opportunity policies is that women and men are to share the same rights, responsibilities and opportunities to employment that provide economic independence; to care for children and the home, and to participate in political, trade unions and other activities in society. The National Plan towards the year 2000 establishes the following goals for shared power and responsibility:

• Eliminate sex segregation in education.

• Eliminate sex segregation in occupations.

• Improve women’s advancement and influence at work.

• Achieve equal pay for equal work.

• Increase men’s participation in the care of children and home.

• Guarantee freedom from sex-related violence.

• Increase women’s presence in decision making and advisory organs.

The National Plan also includes actions to fulfill the goals of equality and identifies the necessary tools to work with gender issues.

In the Philippines, the Philippine Plan for Gender-Responsive Development (1995–2025) specifies gender-related goals and objectives and sets forth comprehensive policies, strategies and programmes for adoption and implementation by all government agencies, NGOs and the private sector to address identified issues. The PPGD proposes the following programmes and strategies:

• Mainstream gender concerns in sectoral development plans, policies and programmes.

• Intensify awareness campaigns on gender issues and concerns especially among policy makers and extension workers.
- Strengthen GO-NGO cooperation to maximize the effectiveness of programmes and services addressing GAD concerns.

- Promote a selective overseas employment programme that stresses decent wages and low risk placement in priority countries with established mechanisms for the protection of migrant women workers.

- Support and expand the participation of grassroots women in the planning, implementation, monitoring and evaluation of development programmes and projects.

- Revise textbooks and curricula at all school levels to ensure gender sensitivity.

- Provide gender-responsive relief and rehabilitation programmes with special focus on women’s needs.

- Involve men in family planning programmes and in health, childcare and nutrition concerns, and engage them in projects that enhance the well-being of the family.

- Set up crisis intervention centers or shelters in each municipality and upgrade existing crisis centers or shelters for victims of violence against women and other social conflicts.

- Promote gender sensitivity in media and advertising and make media practitioners aware of the harmful effects transmitted by stereotyped messages.

- Review pending bills on women’s concerns, including rape, domestic violence and prostitution.

- Increase the number of women in policy making posts in both elective and appointive positions through capability building.

- Review counter-insurgency policies, strategies and tactics as well as military selection and training from a gender perspective.

- Encourage women’s entry in non-traditional fields and professions.

- Establish the necessary mechanisms to enable indigenous women to participate in development programmes and gain access to non-traditional sources of livelihood, credit, productive skills and labour saving technologies.

The European Union Fourth Medium-Term Community Action Programme on Equal Opportunities for Women and Men 1996–2000 calls for action to be concentrated on a limited number of clearly defined aims:

- Mobilise all the actors in economic and social life to promote equal opportunities.

- Promote equal opportunities as a means of adjusting work life to the changes taking place, mainly through the Structural Funds.

- Encourage a policy to reconcile family and work life for women and men.

- Promote a gender balance in decision making.

- Ensure that conditions are more conducive to women who are nationals of or resident in the Union exercising active citizenship.

- Support implementation, monitoring and assessment of activities conducted in order to achieve the above aims.
Identification of national gender issues, problems and goals

The national statistical system produces gender statistics on the basis of problems and goals identified in the national policies and plans. Statisticians, in collaboration with policy makers and other groups of users, look at gender issues, problems and goals as identified at the national level.

Each of the main policy areas (as in the section Gender issues worldwide) includes a number of specific problems to be addressed by policies and measures. In addition, each problem has to be investigated in order to identify underlying causes, to assess the effects, and to understand interrelations among different issues. To bring about changes and address problems, it is indispensable to understand the underlying causes of problems. Effective policies and measures have to address the causes of gender concerns and inequalities.

Illiteracy among women reflects the unequal access to education of girls and boys and higher dropout and absenteeism rates for girls. Poverty is the result of unequal access to resources, to paid employment and education. It is also linked to migration and household structure and composition. High maternal mortality is the result of lack of adequate health services, high fertility rates and poverty. Fertility and education are highly interrelated. The sex of the head of the household and children’s opportunities in life, or allocation of resources are believed to be interrelated. All these causal relations and interrelationships need to be investigated. The effects of problems need to be assessed and monitored.

In the following, two examples of problems and related causes and effects are shown. The first problem considered, within the policy area of economic life, is the occupational segregation in the labour force, where women often concentrate in the lower paid and less prestigious occupations. Occupational segregation is due to several factors such as traditional roles and stereotypes in society, different responsibilities of women and men in the household, etc.

The second problem shown, within the policy area of education is the high illiteracy among women and the large differential with men. Among others, the underlying causes identified are unequal access of girls and boys to education, high dropout rates for girls and unequal access to literacy programmes because of the different roles and responsibilities women and men have. Each of these main causes is in turn due to several other factors, also shown here. Finally, some of the effects of the high illiteracy of women are identified, such as its effect on the age at marriage and at first birth and the number of children a woman will have during her life.

All problems and gender concerns can be analysed in a similar way. Within a policy area there are several problems/concerns, and for each problem it is possible to identify causes and effects.

Statistics related to gender

In the next chapter we will see how to use statistics to address problems and goals, identify underlying causes of problems, investigate interrelationships among different issues, assess effects and promote changes. Statistics help identify underlying causes and effects of problems and are needed to investigate interrelationships among different gender issues in society.
Policy areas, Problems and Concerns
Example 1

Policy area
Economic life

Underlying causes

- Sex segregation in education
- Unequal sharing of responsibilities within the family
- Women’s reproductive role
- Employers’ prejudices and stereotypes
- Individual choices and preferences in occupation

Problem/concern

Occupational segregation in the labour force with women in lower status occupations than men

Consequences/effects

- Different wages and salaries
- Different career opportunities
- Different roles in decision making

There are also, underlying factors to these causes, e.g., parents’ attitudes; their occupations; role models in society when girls/boys grow up.
Policy areas, Problems and Concerns
Example 2

Policy area
Education

Underlying causes

- Family’s preferences for investing in sons’ education
- Social and cultural barriers
- Demand for labour in subsistence agriculture
- Girl’s work in the household
- Lack of transportation considered appropriate for girls
- Women’s responsibility in the household
- Childbearing
- Social and cultural barriers
- Inadequate formulation of programmes

Consequences/effects

- Lower access to information and media
- Lower access to training programmes in agriculture, etc.
- Lower age at marriage
- Higher fertility
- Lower mobility and access to paid work
- Effect on child survival

Problem/concern
High women’s illiteracy and large differential with men
3. Statistics and Indicators on Gender Issues

To address gender issues in society and to achieve and monitor national and international goals, policy makers need statistics. Statisticians – responsible for the development of the statistical system and the production of statistics in various fields – and policy makers jointly identify needed statistics and indicators.

Why gender statistics?

Women and men have different roles in society, have unequal access to resources and are affected by policies and measures in different ways. Policies and measures, when not adequately tailored to existing gender differentials, tend to perpetuate and exacerbate inequalities.

Statistics should be the basis for action and for people’s perceptions and ideas at all levels. Statistics related to gender issues are even more important since the perception of gender roles is very often wrong. People are influenced by stereotypes and by old customs and traditional concepts. In countries where laws and rules guarantee equality and protect human rights, people tend to believe that equality de facto has been achieved and underestimate the existing discrimination. And wrong perceptions prevent people from changing the situation.

Statistics help promote change, demolish stereotypes and promote understanding of the actual situation of women and men in society. Statistics give a basis for the formulation of policies and for the evaluation of measures.

Decisions concerning economic and social policies are made on the basis of economic statistics and national accounts figures. Socio-demographic policies are formulated according to statistics and indicators from household surveys and censuses. Health and social services are designed on the basis of health and demographic statistics. Problems and deficiencies in existing statistics undercut efforts to bring about changes and perpetuate the existing stereotypes.

Statistics on women and men are needed to:

-Raise consciousness, persuade policy makers and promote changes.
-Inspire measures for change.
-Provide an unbiased basis for policies and measures.
-Monitor and evaluate policies and measures.

Statistics are figures, i.e., numerical information answering the question How much? How many? They are usually presented in aggregate form as numbers or proportion in tables and graphs.

Indicators

Indicators are statistical information chosen specifically to shed light on a specific economic, demographic or social problem or question. Indicators can be a single figure or a distribution. Figures can be expressed as numbers, percentages, rates or ratios.
**What is gender statistics?**

The production of gender statistics requires not only that all official data are collected by sex, but also that concepts and methods used in data collection and presentation adequately reflect gender issues in society and take in consideration all factors that can produce gender-based bias. The production of gender statistics concerns the entire official statistical system and covers data from different sources and statistical fields.

Gender statistics are not produced and improved in isolation. The work is integrated into the development of the entire national statistical system. Improvement of content, methods, classifications and measurements are made within the ongoing work to improve statistical sources – censuses, surveys and administrative systems. Gender statistics not only provide general comparisons between women and men, but ensure that women’s and men’s participation and contribution in society are correctly measured and valued.

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**Statistics on Women – yesterday’s approach**

Initially, the demand for data and indicators on the ‘situation of women’ came from women’s organizations and women’s advocates. Users dealing with women’s issues had begun to realize that to promote changes, to formulate new policy and correct inequalities they needed facts. At the World Conference on Women in Nairobi 1985, governments called attention on the production of ‘statistics on women’ and women’s machinery was designated as the responsible body for storage and presentation of statistics on women.1

It was generally believed that statistics on women were something new to be collected separately and presented as a separate set of data. The difficulty in obtaining statistics on women was then associated with the lack of data by sex. In fact, in many countries data were already collected by sex, although often not adequately analysed and made available to users. The first step was to compile available data on women in databases or simple publications easily accessible by a large audience.

**Gender statistics – today’s approach**

Today, policy makers are aware of the importance of mainstreaming gender issues, as opposed to specific actions/measures for women. The focus has shifted from ‘women only’ to ‘women and men’ and from the production of statistics on women, to the mainstreaming of gender issues into the production of all statistics. Statisticians now recognize that improvement is needed in statistics on men as well and that biases and data gaps exist in statistics on both women and men. The demand for gender statistics comes from policy makers at all levels and from a broad audience. It is now clear that to obtain adequate information on all individuals, taking in consideration their differences in all spheres of society, the entire statistical system has to reflect gender issues. Gender issues have to be integrated in the production of all official statistics, at all steps of production, from the identification of data needs to the final presentation and dissemination.

More attention today is paid to the way data are presented and disseminated and to the cooperation between users and producers in order to address the right problems and produce the
necessary data. Gender statistics now has a broader meaning that not only covers the concept of statistics on women and men, but implies that data are produced and presented to reflect women’s and men’s conditions and contributions in society, their needs and their specific problems.

The production of gender statistics needs a close and continuous cooperation between users and producers. Statisticians must make efforts to understand gender issues and problems to be addressed in data collection. Users on the other hand, must learn how to communicate their needs to statisticians and how to use statistics in their work.

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<tr>
<th>YESTERDAY’S APPROACH</th>
<th>TODAY’S APPROACH</th>
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<tbody>
<tr>
<td>Statistics on women</td>
<td>Gender statistics</td>
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**For whom?**
- Statistics on women for women’s advocacy
- Statistics on women and men on all spheres of society for all policy makers, planners and ordinary people

**What are the problems?**
- There are no statistics on women
- Statistics do no reflect gender issues
  - Systematic errors or biases often occur in statistics on women and men

**What needs to be done?**
- Statistics have to be collected by sex and statistics and indicators have to be calculated, analysed and presented for women only
- Statistics on women have to be:
  - collected
  - stored in women’s databases
  - presented separately
- All statistics have to be produced, analysed and presented by sex and reflect gender issues in society
  - The production of gender statistics has to be integrated into the entire statistical system for:
    - collection
    - storage
    - presentation

**Whose responsibility is it?**
- Women’s machinery/organizations
- Official statistical system
Users of statistics

Gender statistics are needed in different contexts: to inform the public and the media; as a basis to formulate, monitor and evaluate policies, programmes and projects; as a basis for analysis and investigation of causes and effects of different phenomena and relationships among different variables. These various needs correspond to different groups of users and types of statistical presentations and products.

Users have different levels of statistical knowledge. Statisticians, economists, sociologists, policy makers, project planners and executors are generally trained to use statistics in their work. Ordinary people, scholars without statistical training, media, many policy makers and representatives of women’s machinery, NGOs, etc. may not be at all familiar with quantified information. More sophisticated users – such as analysts and researchers – use data for further analysis and research and need detailed data on specific topics and often original data from computer records.

Users vary also depending on their understanding of gender issues in society. Gender issues advocates, members of women’s machinery or women NGOs and other users working on gender issues are familiar with gender analysis and generally have a good understanding of gender statistics. Other users, such as policy makers not aware of gender concerns, need to be guided in the correct use of gender statistics.

Analysis and presentation of gender statistics and the different types of statistical products will be discussed in Chapter 5, see page 79.
We can also look at users from the point of view of their problems and goals. It is then possible to distinguish different levels: high decision making level, planning, project formulation and implementation, grassroots level, dissemination of information through different media, etc.

**Users – producer cooperation**

Depending on their problems, goals, level of statistical training and knowledge of gender issues, users need different types of statistical products. Producers of gender statistics have to address users’ specific needs. Also, users trained in statistics can cooperate with producers in preparing publications and disseminating gender statistics among ‘statistical illiterate’ users. Users who are already gender sensitive also play an important role in stimulating the production of new statistics and a wider use of gender statistics.

Users who already work in the area of gender analysis and decision making cooperate with statisticians. They remind producers of the importance of gender statistics and promote the use of gender statistics among other groups of users, including those who are not aware of gender issues.
Working with gender statistics

Ideally, the production of gender statistics should be integrated into the overall production of statistics and all statistics should reflect gender issues in society. But before the statistical system is able to provide the public and policy makers with adequate statistics, some specific activities are needed to improve concepts, methods, presentation and dissemination of data.

Work to improve gender statistics is ongoing in many countries and international agencies assist in these efforts by revising standards and guidelines. During the last 10 years much has been done to improve gender statistics world-wide. Many international agencies and national offices have participated in this work. Efforts to change international standards, concepts and methods to better reflect the reality of women and men have begun to affect the production of gender statistics in the world. Strategies to improve presentation and dissemination have been developed and applied in many countries. The production of guidelines and manuals has also been a part of this effort.

Data presentation and dissemination

A crucial area of work in gender statistics concerns the presentation and dissemination of data. Statistics on women and men are often produced but not available to users. Also, data are often analysed and presented without considering users’ needs and thus fail to reach the target audiences.

One strategy has been to strengthen the dialogue between producers of statistics and various groups of users. This has facilitated the identification of topics to be addressed and analysed and the preparation of user-friendly publications that can reach a large audience.

Concepts and methods

Conventional concepts and methods used in data collection are often inadequate to reflect the realities of women and men. Also, with deep changes in societies – in family, economic and public life – new policy concerns have emerged that need to be reflected in new concepts and new methods of data collection and analysis.

Definitions and classifications have been revised to better reflect women’s and men’s situations and contributions. The adoption of these new definitions have been promoted in countries, through manuals, handbooks and training workshops and seminars, and efforts have begun to show results.

Important areas of concern are: the measurement of paid and unpaid work, of women’s and men’s participation in the informal sector and of unemployment. Also, the new System of National Accounts, recently revised by the United Nations, recommends the inclusion of all production of goods within the household for own-consumption – unpaid work largely contributed by women – in the measurement of the economic output. Finally, alternative methods of measuring women’s and men’s activities, such as time use studies have gained increasing interest in many countries.

Manuals and guidelines specifically concerned with the production of gender statistics were produced. These manuals cover all aspects of data collection, from the planning of the operation to the training of the enumerators and the formulation of questions. Specialized agencies, like FAO, have developed guidelines on data collection in their specific fields of interest.

International network

An important part of the work in the area of gender statistics is the coordina-
tion among those active in the field. The improvement of gender statistics is promoted and carried out by many different international, regional and national bodies, following common strategies and aiming at common objectives. The network includes international agencies and consultants, national statistical offices, women’s machinery in countries, researchers working on time-use studies, labour statisticians working on definitions, and other agencies, not directly working with statistics, but concerned with gender issues, that significantly contribute to the process.

Gender statistics units in national statistical offices
Work to improve gender statistics should be formalized as an area of responsibility within the statistical office. A special unit or a focal point for gender statistics should be established as a subject area or field of work in the statistical office. It should have a catalytic role in user-producer cooperation and in improving statistics related to gender issues throughout the statistical service. Compilation and presentation of statistics should cover all areas of concern and relate to the various statistical fields. Representatives from the statistical units involved – labour force, demographic, social, etc. – should collaborate in developing the plan of work. Ideally, the unit should also have a continuous dialogue with policymakers. Regular contacts with ministers, planners and others involved in decision making at national and local levels should be established.

Gender statistics in the Beijing Platform for Action
The Platform for Action recognizes the need for gender analysis and for mainstreaming a gender perspective in policy development and in programme implementation. Also, it urges governments and international organizations to promote research and dissemination of information on a number of important areas and it expresses the need for statistics on objectives and strategies in various target areas.

The Platform also has a specific strategic objective dealing with gender statistics, objective H.3 ‘Generate and disseminate gender-disaggregated data and information for planning and evaluation’ (para 209–212), under the critical area ‘Institutional mechanism for the advancement of women’.

The main goal expressed by the Platform is that all statistics related to individuals are collected, compiled, analysed and presented by sex and age and that they reflect problems, issues and questions related to women in society. For the improvement of gender statistics the Platform also recommends that appropriate staff be appointed to work on gender statistics programmes.

Special attention is given to the problem of measuring women’s and men’s paid and unpaid work. The Platform also recommends improvement in other important areas of concern for gender analysis and planning, such as poverty, vital and morbidity statistics, disabilities, access to health services, violence, and decision making.

The Platform calls on the United Nations to promote the development of methods for the production of data on human rights and violence, and for the improvement of data on economic, social, cultural and political development. The United Nations should also prepare a new issue of the international statistical publication The World’s Women at a five-year interval, assist countries in this area of work and ensure that all relevant data are transmitted to the Commission on the Status of Women.
Main needs for improved gender statistics expressed in the Beijing Platform for Action 1995

A. Improve production and use of gender statistics
- Ensure that statistics related to individuals are collected, compiled, analysed and presented by sex and age, and reflect problems, issues and questions related to women and men in society
- Ensure the regular production of a gender statistics publication suitable for a wide range of non-technical users
- Designate staff to strengthen gender statistics programme and ensure coordination, monitoring and linkage to all fields of statistics, and prepare output that integrates statistics from various subject areas
- Ensure that users and producers of statistics regularly review the adequacy of the official statistical system and its coverage of gender issues, and prepare a plan for needed improvements, where necessary.

B. Improve concepts, definitions, classifications, measurements and collection of statistics by sex on:

Power and decision making
- Power and decision making in all spheres of society

Work and economy
- The full contribution of women and men to the economy
- Unremunerated work which is already included in the UN System of National Accounts (SNA)
- Unemployment and underemployment
- The value, in quantitative terms, of unremunerated work that is outside SNA for possible reflection in satellite or other official accounts, that may be produced separately from but are consistent with core national accounts
- Activities for time use statistics and regular time use studies at national level, for international comparisons
- Poverty
- Access to and control over resources
- Working conditions

Violence and crime
- Victims and perpetrators of all forms of violence against women

Health and disability
- Vital and morbidity data
- Access to health services
- Participation of persons with disabilities including their access to resources.
Identification of needed statistics

In the previous chapter, ‘Gender issues’, we saw how users and producers together look at problem areas and specific concerns, their underlying causes and their effects. The next step is to identify statistics needed to address the problem/concern, investigate the causes, assess the effects and analyse the relationships with other variables. All these statistics and indicators have to be identified and listed, whether they are available and regularly produced or not.

Different hypotheses on underlying causes, on effects and interrelations among different issues can be made. Data will then be used at different levels by statisticians and analysts to test these hypotheses and establish the interrelations among variables. The results of these analyses and studies will probably help identify new gender issues that require new statistics and indicators and improvement and changes in existing statistics for further analysis. It is a continuous process in which statisticians, policy makers, analysts and researchers work in close collaboration.

The statistics and indicators identified to address one specific problem/concern come from different statistical fields. The official statistical system is usually organized by statistical fields. Each office/unit is responsible for a specific field (labour force statistics, demographic statistics, social statistics, time use statistics, health statistics, etc.) and for data collection, compilation and presentation of data in that field. Gender statisticians will have to gather statistics from different fields, collaborating with colleagues from different units/offices. Statistics and indicators can then be grouped according to their relation with problem areas or according to the various statistical fields. The presentation can also be made according to problem areas or to statistical fields, depending on the type of statistical output/publication and users.

In the following, examples on needed statistics and indicators are presented for the two examples of problems related to gender, presented in the previous chapter. Suggestions for needed statistics are presented for the underlying causes and effects of the problem ‘occupational segregation in the labour force with women in lower status occupations than men’ in the policy area ‘economic life’ and for the problem ‘high women’s illiteracy and large differential with men’ in the policy area ‘education’.

It is important to note that statistics and indicators are not identified for all underlying causes and effects (see Example 2, ‘high women’s illiteracy and large differential with men’). In some cases, experts’ judgements, qualitative considerations, anthropological studies or other types of information are more suitable.

It should also be noticed that all needed statistics are listed, irrespective of whether they are produced and available or not. It is only in the next phases of the process of gender statistics production that we identify available statistics and assess their quality. The difference between needed statistics and available statistics represents the identification of data gaps, which is a crucial step for the improvement of gender statistics. These phases of the process are discussed in the next chapter.
Needed statistics and indicators

Example 1  
Policy area  
Economic life

Examples of needed statistics are listed for the problem, their underlying causes and consequences.

All statistics should be presented by sex.

Underlying causes

Sex segregation in education

(a) Population 15 years and over by level of education and age
(b) Population with third level education by field of study and age
(c) School enrollment at third level by field of study
(d) Population economically active by level of education and age
(e) Population economically active with third level education by field of study and age
(f) Population economically active by level of education and occupation

Unequal sharing of responsibilities within the family

(a) Time spent in paid and unpaid work by marital status
(b) Time spent in paid and unpaid work by marital status and number and age of children
(c) Time spent in different activities of unpaid work by marital status, with and without children
(d) Employed population by marital status and age
(e) Employed population by marital status, number and age of children

Women's reproductive role

(a) Economically/not economically active population by marital status and number of children
(b) Employed population leaving the labour force after birth of the first/second child
(c) Employed population on parental leave

Employers' prejudices and stereotypes

(a) Employers’ preferences for women and men as employees in different occupations
(b) Numbers of law suits for sex discrimination in the workplace

Individual choices and preferences in occupation

(a) Graduated from second/third level education by preference of occupation
(b) Graduated from second/third level education by occupation actually chosen
(c) Vocational trainees by field of study
**Problem/concern**

- Occupational segregation in the labour force with women in lower status occupations than men
- Population economically active by occupation

**Consequences/effects**

- **Different wages and salaries**
  - (a) Wages/salaries by occupation
  - (b) Wages/salaries by industry
  - (c) Wages/salaries in public and private sector

- **Different career opportunities**
  - (a) Employed population by career position in the workplace
  - (b) Employed population by career position and public/private sector
  - (c) Employees by industry and size of enterprise
  - (d) Employers by industry and size of enterprise

- **Different roles in decision making**
  - (a) Employed population by career position in the workplace
  - (b) Employed population by career position and public/private sector
  - (c) Employees by industry and size of enterprise
  - (d) Employers by industry and size of enterprise
  - (e) Members and elected officials in trade unions by union
  - (f) High level officials in ministries
### Needed statistics and indicators

#### Example 2

<table>
<thead>
<tr>
<th>Policy area</th>
<th>Education</th>
</tr>
</thead>
</table>

Examples of needed statistics are listed for the problem, their underlying causes and consequences.

### Underlying causes

#### Family's preference for investing in sons' educations

- Unequal access to education opportunities
  - (a) Primary school enrollment ratios

#### Social and cultural barriers

<table>
<thead>
<tr>
<th>Demand for labour in subsistence agriculture</th>
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</table>

- (a) Time children spend working in the household and in subsistence agriculture/time they spend in education

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<thead>
<tr>
<th>Girl's work in the household</th>
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</table>

- (a) Time children spend working in the household and in subsistence agriculture/time they spend in education

<table>
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<tr>
<th>Lack of transportation considered appropriate for girls</th>
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</table>

- Higher dropout and absenteeism rates for girls
  - (a) Dropout rates by reason in public/private schools
  - (b) Rates of absenteeism by level and grade in public/private schools
  - (c) Rates of repetition by level and grade in public/private schools

<table>
<thead>
<tr>
<th>Women's responsibility in the household</th>
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</thead>
</table>

- (a) Time spent in housework by type of activity (care of children, of elderly, meal preparation, etc.)
- (b) Time spent in unpaid work in the household for subsistence

<table>
<thead>
<tr>
<th>Childbearing</th>
</tr>
</thead>
</table>

- (a) Total fertility rate

<table>
<thead>
<tr>
<th>Social and cultural barriers</th>
</tr>
</thead>
</table>

- Inadequate formulation of programmes

---

1 Note that statistics and indicators are not identified for the analysis of all underlying causes and effects. In some cases, experts' judgements, qualitative considerations, anthropological case studies or other types of information are more suitable.
Problem/concern

High women’s illiteracy and large differential with men

Illiteracy rates by age group in urban/rural areas

Consequences/effects

Lower access to information and media
(a) Time spent reading newspapers/listening to the radio/watching TV
(b) Time spent participating in community activities

Lower access to training programmes in agriculture, etc.
(a) Enrollment in agricultural training programmes
(b) Agricultural extension workers
(c) Holders reached by extension workers

Lower age at marriage
(a) Average age at first marriage in urban/rural areas, by level of education

Higher fertility
(a) Total fertility rate in urban/rural areas, by level of education
(b) Average age at first birth in urban/rural areas, by level of education

Lower mobility and access to paid work
(a) Employed population by status in employment and level of education
(b) Employed population by occupational group and level of education

Effect on child survival
(a) Infant mortality rate by level of education of the mother/by level of education of the father
(b) Child mortality rate by level of education of the mother/by level of education of the father
List of Statistics and Indicators on Gender Issues

A very important tool in gender related work is an overview of the situation of women and men in society provided by a set of basic statistics and indicators on specific areas. As seen above, there are specific statistics and indicators necessary to understand and analyse problems and concerns and often the same statistics are related to different problems. Also, statistics and indicators concerning a specific problem may come from different statistical fields. To present statistics and indicators on women and men in various areas it is often appropriate to compile the data by statistical field.

The list presented below has been selected on the basis of common experiences with different national publications. Also a sample of lists of statistics and indicators presented in national gender statistics publications is presented in Annex 3.

All statistics should be presented by sex, that is for girls and boys, women and men.

The statistics should also be presented for rural and urban areas, when relevant. Besides the most recent year, which always has to be presented, it is recommended to present one year for comparison or a longer time series when relevant.

Population
1. Total population
2. Population by age (0–4, 5–9, ..., 75–79, ...)
3. Population by age (0–14, 15–64, 65–)
4. Population by rural/urban
5. Internal migration inter-regions and intra-regions
6. Projected population by age

Family and household
1. Population by marital status and age group
2. Married population by type of marriage
3. Average age at first marriage
4. Average age at first birth
5. Total fertility rate
6. Contraceptive use by type of contraceptive
7. Household composition
8. Households by size and sex of head of household
9. Heads of households by rural/urban
10. Heads of households by marital status

Time use
1. Time use (e.g. paid work, unpaid work, education, personal care, leisure time) by age and family situation
2. Unpaid work by type of activity and family situation
3. Leisure time by type of activity and family situation
Work
1. Labour force participation rate by age
2. Economically active population by industry
3. Unemployment rate by age
4. Employed population by employment status
5. Employed population by occupation
6. Employed population by industry
7. Holders by size of holding
8. Subsistence holders
9. Employed population in public and private sector
10. Employed population by hours worked per week
11. Population not in the labour force by activity and age

Economy
1. Average monthly earnings by occupation (groups)
2. Income earners in households by sex of head of household
3. Access to land
4. Access to other property
5. Access to credit
6. Access to agricultural inputs (fertilisers, seeds, irrigation facilities, etc.)

Education
1. Illiteracy rate ages 15–24, 25+
2. Population age 10 and over by level of education
3. School enrollment at primary level
4. School enrollment at secondary level
5. School enrollment at third level
6. Promotion, repetition and dropout rates at primary/secondary level
7. Dropout rates by reason at primary/secondary level
8. Third level enrollment by field of study
9. Graduates from secondary level by field of study
10. College and university graduates by field of study
11. Post-graduate graduates by field of study
12. Enrollment in vocational training
13. Participation in extension programmes
14. Primary/secondary/tertiary level teachers

Health
1. Life expectancy at birth
2. Life expectancy at age 5.
3. Infant mortality rate
4. Infant mortality rate by education of mother
5. Child mortality rate
6. Maternal mortality ratio
7. Births attended by trained personnel by type of training
8. Population with disabilities by type of disability
9. Morbidity rates by type of disease and age
10. Mortality rates by cause of death and age
11. Access to safe water
12. Health professionals by occupation
13. Hospitals/clinics per 1,000 persons
14. Physicians per 1,000 persons
Crime
1 Crime rates by type of crime
2 Victims of violence by type of crime
3 Victims of violence by sex of offender
4 Victims of violence by sex of offender and relationship to offender
5 Employed in judicial professions (lawyers, judges, police, prison personnel etc.)

Decision making
1 Members of Parliament
2 Ministers by policy area (executive office, economic, legal ...) 
3 Officials in sub-ministerial positions (at least two levels)
4 Managers in top positions in public and private sector
5 Population voting in parliamentary elections
6 Members of executive committees in trade unions
7 Members of executive committees in cooperative organizations
4. Data Availability and Quality

By looking at problems and goals in society it is possible to identify statistics and indicators necessary to plan, promote and monitor change.

The next step involves reviewing national sources to assess the availability of needed statistics and their quality in terms of definitions and concepts, methods of measurement, and coverage.

A review of available data will show existing data gaps and identify needs for the improvement of gender statistics in various fields.

Data availability

The process of identification of data needed to address societal problems and goals results in a detailed list of statistics and indicators. Some of these data will not be available or not easily accessible. Several situations are possible:

- data are collected, tabulated and published (in different forms including yearbooks, booklets, CDs, diskettes)
- data are collected and tabulated, but not published (can only be obtained by specific request)
- data are collected, but not tabulated (available only on the original record tapes and obtainable by specific request)
- data are collected but not entered into the computer (available only in questionnaires)
- data are not collected at all or are not collected by sex.

There are different reasons why data regarded as relevant by users are not collected. Often, they concern new policy issues difficult to quantify and measure. Statisticians are not sensitive to some important policy concerns or when resources are limited they give priority to other issues.

Finally, some topics are considered too sensitive to be investigated. In all these cases we talk of data gaps. In gender statistics there are areas where data are likely to be scarce or unreliable, irrespective of the level of development of the statistical system and of resources available.

A wide range of problems may also arise when users need to access existing data or when statisticians themselves need to compile data from different sources in a publication or database. Data are often scattered in different places and difficult to locate. Finally, when data are available they are often subject to quality problems.

Data quality

In gender statistics, the assessment of data quality and reliability is particularly important. As discussed in the previous chapters, gender-based stereotypes and biases existing in reality are often reflected in the production of statistics. Moreover, in data collection a wide range of errors may occur. A lot can be done to prevent errors and biases by accurate planning, designing and implementation of the data collection programme.
Planning and designing the census or survey
- identify specific problems and data needs
- establish users/producers communication
- decide whether data from the whole target-population or a sample should be collected
- operationalize the plan
  - define linkage with other surveys
  - define resources and staff involved in the operation
  - review existing data in the fields of the survey
  - define coverage of the survey
  - prepare the preliminary tabulation plan

Defining methods
- concepts and definitions
- data collection instruments
- reference period

Survey operations
- training personnel
- pre-test
- data collection

Data preparation

Data processing
- tabulation
- analysis

Data presentation

Dissemination of results

Defining concepts and methods

Assess data quality
Sources of errors in data production

Planning and designing a survey
Planning and designing the survey are crucial steps to ensure that adequate statistics and indicators are produced to address existing problems and to achieve goals in society. This stage is particularly relevant to gender statistics for two main reasons. First, there are topics that tend to be overlooked and need to be clearly specified at the beginning of the operation. Second, the production of gender statistics often implies the development of new ideas and methods that need to be introduced and discussed at the initial stages of the data collection.

Setting clear objectives and specific data needs is essential to ensure that everyone understands the importance of collecting gender statistics and is responsive to change. The participation of users and their assistance in identifying objectives are also essential elements at this stage.

Advertising the survey
In some cases, (i.e., telephone surveys) information must be sent in advance to individuals in the sample to explain the objectives and structure of the survey. In other situations, the purpose of the survey is publicized through media (newspapers, TV, radio, etc.). In countries where the population is predominantly rural, it may be difficult to reach all those included in the sample. And where women have scarce access to information and media, are more often illiterate than men and have fewer public contacts, they are more likely to be missed by the information campaign.

Defining the coverage
At this stage, problems arise when enumeration units relevant to the objectives of the survey are omitted for different reasons. Geographical areas, units below a size limit, mobile units, etc., might be excluded from the enumeration because of limited resources or wrong assumptions. In agricultural censuses, for example, small holdings are often excluded from the enumeration. This practice overlooks units mainly engaged in food production essential to the survival of the population and where women farmers often predominate.

Enumeration frame and sample design
The enumeration frame might be too old, incomplete, or exclude certain categories, resulting in the omission of enumeration units and in serious biases. It is always important to assess how these exclusions affect the quality of results in general and in terms of gender differentials.

The sample design is a very important step in the data collection programme. The variables used for stratification, the kind of sample and the size, all influence directly the quality of data collected. The sample should be representative both in space and in time and large enough to allow the inclusion of an adequate number of women and men and stratification on both sexes. In some cases, strong gender differentials in certain variables may require oversampling in one or more strata.

Concepts and definitions
Before the specifications and list of questions for the questionnaire are prepared, the underlying concepts and definitions need to be specified. The concepts and definitions adopted largely affect the quality of gender statistics. There are several steps involved:

1. adoption of a definition, usually on the basis of the suggested international standard adapted to the specific circumstances of the country;
2. specification of the criteria to apply the definition in practice;
3. specification of criteria for the classifications of variables, usually on the basis of suggested international standards adapted to the specific circumstances of the country.

Gender-based biases and errors often originate from inadequate planning and design of data collection programmes.
Errors may occur at different stages in the data collection process:

- planning and designing the survey
- advertising the survey
- defining the coverage
- defining the enumeration frame and the sample design
- formulating concepts and definitions
- designing the questionnaire
- defining the reference period
- selecting and training the enumerators
- selecting the respondents
- checking and coding of the results

All the above will then have to be adequately reflected in the questionnaire, in the instructions and training manuals, and in all the training procedures, to ensure the correct measurement of the concepts adopted.

Concepts, definitions and classifications are the elements that influence the quality of gender statistics the most and determine whether or not data reflect the real situations of women and men in society. The definition used for the head of household and the criteria for its application will determine the number of women and men belonging to this category. When the head of the household is defined as the main income provider, but the criteria specified for the interviewers tend to favour the identification of adult male rather than the female members, most likely women heads of households will be underenumerated, even when they are the sole income providers of the family. Similarly, considerable differences in economic activities may depend on the way the economically active population is defined and measured. A methodological survey carried out in India showed that labour force rates for women varied from 13 to 88 per cent when different definitions of economically active were used.¹

**Questionnaire and language**

The order of questions, the way questions are formulated, the language used and the choice of single ‘key words’, all affect the answers and the quality of the information collected. They influence respondents in different ways and may introduce gender-based biases.

The language used in questionnaires may significantly influence answers. Some terms are susceptible to different interpretations and result in ambiguity. In certain cases, technical language may sound, incomprehensible to people who are not adequately trained in the subject in question. Language can also introduce sex-based biases that affect both enumerators and respondents. Terms such as ‘fisherman’ or ‘man hours’ tend to be applied to men exclusively, while terms such as ‘housewife’ automatically exclude men from the category. Even gender-neutral terms, such as ‘farmer’, may be associated with a particular sex. The choice of words is crucial for an unbiased measurement of women’s and men’s situations.

In countries where women’s and men’s levels of education differ significantly, the kind of language used in the questionnaire is particularly important. Women are more likely to be put at a disadvantage when technical language is used, rather than simple understandable words. In these countries, especially in rural areas, women have very little opportunity to be exposed to public contact, media and training, and to familiarize themselves with technical terms. Also, they are more likely than men to be illiterate.

The way questions are formulated is also very important for the success of the survey. Questions that appear clear and straightforward can end up being ambiguous and confusing. For instance, it is usually not enough to ask whether or not a woman ‘works’. Women tend to underestimate their own work and to regard what they do simply as housework. In a study in Chile it was noted that women defined planting and harvesting as housework.² In addition, enumerators often apply their own perception of gender roles. They tend to assume that men are the bread winners
in the family and to underestimate women’s actual work.

The choice of words used in questions and the way the question is formulated are then crucial to avoid misinterpretation and to obtain correct answers. Studies on this issue have demonstrated that the use of certain ‘key words’, such as ‘work’, ‘job’ or ‘main activity’ are susceptible to misinterpretation and that activity rates for women vary depending on the words used in the question. Giving examples of activities or specifying a complete list of activities that count as work has proven more effective than a simple question. In Bangladesh, women’s labour force participation rate went from 10 per cent in 1985/86 to 63 per cent in 1989 when a new questionnaire was introduced, which included a list of specific activities such as threshing, food processing and poultry-rearing.3

Men are often reluctant to admit that their wives or daughters work, because of the implications that this has for social status and for other cultural and religious factors. This needs to be taken in consideration in the formulation of questions and in the training of the enumerators.

**Reference period**
The length of the reference period affects the measurement of the economically active population, as well as other important variables. Where agricultural activities fluctuate seasonally, or work is linked to tourism, or other seasonal phenomena, the reference period should preferably be long. The choice of the reference period has implications for gender statistics, since women engage in seasonal activities more often than men.

**Training of the enumerators**
The training of the enumerators is particularly important in determining the quality of gender statistics. The interviewer may significantly influence the answers of the respondents. Many cultural and social factors intervene, especially in cultures where women and men cannot easily interrelate or it is not socially accepted that women work. In some countries, the presence of female enumerators is crucial for the success of the survey.

To reduce gender-based biases enumerators should become aware of their role and their potential errors in the interviewing process. Enumerators should be particularly trained on the meaning and use of concepts relevant to gender issues such as head of household and economic/non-economic activity. They should discuss their ideas and stereotypes about women and men and the effect of using sex-specific words during the interview. Ways of training enumerators on gender issues in data collection have been developed in several countries and are suggested in manuals.4

**Selection of respondents**
The selection of the respondent influences the quality of data collected, for several reasons. When the respondent is a man, he may be reluctant to admit that his wife works or may have problems talking about issues related to children and childbearing. Also, a respondent might not be knowledgeable enough to talk about the rest of the household.

Another factor that needs to be taken into account is the presence of other persons during the interview, which can be deterrent to obtaining accurate responses.

**Checking, imputation of missing values and creation of new variables**
Before data are processed and tabulated, the questionnaires are checked, answers are coded and data are entered into the computer and edited with the available software. In all these phases, the quality of the work largely depends on hardware and software facilities and on the staff involved in the editing and data entry.

In the imputation of missing values and creation of new variables, it is important to avoid wrong assumptions due to gender stereotypes. In the coding
of occupational groups, for example, sometimes women are automatically excluded from some of the groups only on the basis of the preconception that they could not be employed in certain occupations.

Assessing data quality
As discussed in the previous section, the quality of the results in data collection is affected by concepts and definitions used and the methods adopted at every stage of the operation. Knowing about data quality and sources of error is necessary for the proper use of data and to correct and improve survey methods and procedures. In gender statistics this aspect is particularly important. For all the reasons seen above, gender statistics are particularly susceptible to problems and biases.

Generally, in sample surveys there are two groups of errors: sampling errors and non-sampling errors. Sampling errors include sampling or estimation bias and sampling variance. In the following, we will concentrate on non-sampling errors that are more relevant to the content and objectives of this publication. Non-sampling errors include:

- errors related to the conceptual and substantive content of the survey;
- errors concerning coverage and non-response.

The first group of errors may arise during all phases of the survey and concern: inadequate concepts and definitions; wrong planning and definitions of objectives; wrong formulation of questions and inconsistency in the set of questions; communication problems between interviewers and respondents, biased perceptions on the side of the interviewers; and errors during data processing.

Some of the typical causes of errors in this group are the following:

- **Wrong selection of respondent.** The respondent cannot report correctly on other individuals belonging to the same units;
- **Inadequate concepts.** Concepts used in the survey do not adequately reflect the reality.
- **Enumerators’ errors.** Enumerators not sufficiently trained or negligent pose questions in the wrong way or report incorrect values, introduce biases, etc.
- **Wrong formulation of questions.** The question is not adequately formulated in the questionnaire.
- **Problems of communication.** Respondent does not understand the content of the questionnaire, or the language. The interviewer cannot communicate easily with the respondent because of social, cultural or religious factors.
- **Concealment of the truth.** Respondents deliberately conceal the truth, to answer in a way that is socially accepted or for other fears or suspicions about the purpose of the survey.

The assessment of these errors is complex, but extremely important since it involves the substance of the survey. Sometimes the evaluation of these errors is conducted through analysis of individual records and single field-workers.

### Non-sampling errors

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<thead>
<tr>
<th>Errors related to the content of the survey</th>
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<tr>
<td>- wrong selection of the respondent</td>
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<tr>
<td>- inadequate concepts and definitions</td>
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<tr>
<td>- wrong formulation of questions</td>
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<tr>
<td>- problems of communication</td>
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<tr>
<td>- problems in data processing</td>
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<tr>
<th>Errors related to the coverage and non-response</th>
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<tbody>
<tr>
<td>- inadequate sample frame</td>
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<tr>
<td>- wrong selection of units</td>
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<tr>
<td>- information not collected for some units (complete non-response)</td>
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<tr>
<td>- information not collected for some of the questions (item or partial non-response)</td>
</tr>
</tbody>
</table>
or through investigation at aggregate levels. One effective method – when possible – is the comparison between results using different methods. This has been done in several studies, for example, to identify the most suitable methods to measure women’s and men’s work.

The second type of errors concerns the number and kind of units investigated. These errors arise in the process of extrapolation from the units observed to the entire population and concern mainly problems of coverage and non-response.

Errors of coverage are due to inadequate sample frames and wrong selection of units. For example, part of the population may be omitted from the sample frame or problems in identifying units may lead to duplications or omissions. The assessment of these errors and their effects is usually very difficult since it requires information external to the sample or to the sample frame.

Non-response error occurs when information is not collected for some of the units selected (‘complete non-response’) or for some of the questions for each or for groups of these units (‘item or partial non-response’). Non-response affects the survey results in several ways:

- non-responding units may differ systematically from responding units: the distribution observed in the sample will be distorted and results biased;
- the overall characteristics of the population will be under/over estimated if the missing units are not taken into consideration;
- sampling variance will be higher.

Non-response and ‘item’ non-response rates are usually easy to measure, based on the list of sample units and the number of non-response for each ‘item’. Non-response rates can also be calculated by cause, by stage of the survey and by field worker.

Some specific concerns on quality of gender statistics

Concepts, definitions and classifications

Most of the problems and data gaps in gender statistics come from inadequate concepts and definitions used in surveys and censuses. Women are more often than men in situations that are difficult to measure. They often perform both paid and unpaid work, work in the informal sector, have specific health problems related to childbearing and have limited educational opportunities. Women’s and men’s interrelations in the family and in society are also difficult to measure. Family structure and composition, female and male parental responsibilities, decision making in the family and in society, and many other aspects of gender interrelations are not adequately reflected in concepts and definitions used in conventional data collection. Additionally, in many cultures, social and cultural obstacles and gender-based stereotypes further complicate data collection.

Some of the concepts and definitions used in data collection were developed in the past based on a distorted perceptions of reality and stereotypes where women were regarded as housewives, with no education and no economic role. Very little attention was paid to the specific needs and problems of women and men and to their responsibilities and interrelations in the family and in society.

Development and improvement of gender statistics worldwide have meant development of new concepts and definitions, with significant changes in
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international standards and recommendations. (See also ‘Working with gender statistics’, page 46) However, many countries have failed to adopt the revised standards, many gender issues continue to be ignored in existing concepts and definitions and some topics have only now begun to be investigated.

In the following, some problems related to concepts and definitions and measurement relevant to gender statistics will be discussed.

**Household**

A household is a socio-economic unit consisting of individuals who live together. It is usually defined as one or more persons who make common provision for food or other essentials for living. Problems with the definition of household arise when the composition departs from the simple model of parents with their children. An elderly woman who lives alone and provides for her food is a single-person household. However, the tendency is sometimes to incorporate these one-person households in the household of one of the relatives, when the woman lives close to them (for example, in the same village). This situation applies more often to women since they live longer than men and marry younger, are often widows and live alone the last years of their lives.

Other problems arise in countries where polygynous unions are common. Several wives may live, together with their children, far from each other, and the husband may spend an equal amount of time with each of them or live mostly with one wife. Clear specifications and criteria are needed in these situations to avoid double counting and to avoid that women who are practically alone with their children be recorded as living with their husbands.

**Household headship**

The term head of household is used to cover a number of different concepts referring to the chief economic provider, the chief decision maker, the person designated by other members as the head, etc. The focus changes depending on the specific circumstances of the country. Generally, the definition of head of household reflects the stereotype of the man in the household as the person in authority and the bread winner. And even where the definition is adequate, criteria used by interviewers are often vague and leave room for subjective interpretation. As a result, women are only counted as heads of household when there is no adult male in the household.

Statistics on heads of households are likely to underestimate the number of women who are the actual authority in the household and the main economic support, but give an indication of the number of households where women are the sole economic providers for their children and themselves. As seen in ‘Gender Issues’, page 13 ff, women living alone or with their children,
Illustrative classification of household types

- Lone woman
- Lone man
- Married/cohabiting couple with children
- Married/cohabiting couple without children
- Lone mother with children
- Lone father with children
- Household of siblings
- Two-generation household without children
- Three-generation household
- All other households with more than one married couple
- Household of unrelated persons


and are the sole providers of income are large in number. These households often have special needs and are more vulnerable to poverty, and should always be identified to be adequately addressed by policies.

In countries where relationships within the family are such that no one is in authority and decisions are made collectively, the concept of head of household is often replaced by the concept of ‘reference person’ with the statistical purpose of establishing family relationships of individuals interviewed in data collection. The reference person is not used in tabulation.

Marital status

The marital status is the personal status of the individual in relation to the marriage laws or customs of the country. Categories considered in data collection should reflect local realities. In societies where polygyny is practiced, the distinction should be made between monogamous and polygynous unions. Similarly, where consensual unions are common, these should be included in the classification, because the socioeconomic implications of these unions are different from those of legal marriages.

In the presentation of data, the category ‘married’ should be specified clearly, since it may change from country to country and include or not include separate, divorced or widowed individuals living with a new partner or cohabiting couples when not recorded separately.

Illustrative classification of marital status

- never married
- currently married
  - first marriage
  - second or higher order marriage
- married in polygynous union
- cohabiting (or in consensual union)
- separated
- divorced
- widowed

Access to safe water

The World Health Organization defines access to safe drinking water as ‘water available in the home or within 15 minutes walking distance.’ A safe water supply includes treated surface waters and untreated but uncontaminated water from protected sources.

In countries where households have no access to safe water—this is often the case in rural areas—it is important to specify all sources of water distinguishing between drinking use and other uses and the related distances. This would provide a clearer picture of the sanitary situation of people and would show the extent of the burden on women to carry water from distant sources.

Illustrative list of sources of water supply

- Piped water in dwelling
- Piped water for the compound/community
- Private well
- Public well
- Pond
- River

Economic activities
The way work is defined and measured is one of the crucial areas in gender statistics. While men are more often employed outside the house with a paid job, women do most of the unpaid work and are more likely to be undercounted. The lack of adequate concepts and definitions to measure women’s and men’s work has been widely recognized and international standards have been revised to better reflect the reality.

The definition of the economically active population was revised and broadened by the Thirteenth International Conference of Labour Statisticians (ICLS) in 1982. According to this standard, the economically active population comprises ‘all persons of either sex who furnish the supply of labour for the production of economic goods and services as defined by the United Nations System of National Accounts and Balances (SNA), during a specified time-reference period’.7 What is to be considered within or outside the production boundary of SNA is therefore crucial to the measurement of work. The revision of SNA, adopted by the United Nations Statistical Commission in 1993, brings significant changes especially relevant to the measurement of women’s work.8 It removes some of the limitations concerning production for own consumption. It recommends the inclusion within the production boundary, besides the production of all goods or services for the market, of all production of goods in households for their own consumption. More specifically, the following productions are included:

- production of agricultural products and their subsequent storage; gathering of berries or other, etc.;
- production of other primary products such as mining salt; the supply of water;
- processing of primary commodities, whether or not the primary products are produced within the household or bought in the market;
- other kinds of processing, such as weaving clothes, dress making and tailoring, production of pottery, making furniture, etc., whether or not part of these are sold in the market.

In this revised system, activities carried out mostly by women – such as carrying

Examples of non-market economic activities

<table>
<thead>
<tr>
<th>Primary production</th>
<th>Processing primary products</th>
</tr>
</thead>
<tbody>
<tr>
<td>Growing or gathering field crops, fruits and vegetables</td>
<td>Slaughtering livestock</td>
</tr>
<tr>
<td>Producing eggs, milk and food</td>
<td>Curing hides and skins</td>
</tr>
<tr>
<td>Hunting animals</td>
<td>Preserving meat and fish</td>
</tr>
<tr>
<td>Catching fish, crabs and shellfish</td>
<td>Storing crops</td>
</tr>
<tr>
<td>Cutting firewood and building poles</td>
<td>Storing food</td>
</tr>
<tr>
<td>Fetching firewood</td>
<td>Making butter, ghee and cheese</td>
</tr>
<tr>
<td>Carrying water</td>
<td>Making beer, wine and spirits</td>
</tr>
<tr>
<td>Collecting thatching and weaving materials</td>
<td>Crushing oil seeds</td>
</tr>
<tr>
<td>Burning charcoal</td>
<td>Weaving baskets and mats</td>
</tr>
<tr>
<td>Mining salt</td>
<td>Making clay pots and plates</td>
</tr>
<tr>
<td>Cutting peat</td>
<td>Weaving textiles</td>
</tr>
<tr>
<td></td>
<td>Dress making and tailoring</td>
</tr>
<tr>
<td></td>
<td>Making furniture</td>
</tr>
<tr>
<td></td>
<td>Fixed capital formation</td>
</tr>
<tr>
<td></td>
<td>Construction of dwellings</td>
</tr>
<tr>
<td></td>
<td>Construction of farm buildings</td>
</tr>
<tr>
<td></td>
<td>Building boats and canoes</td>
</tr>
<tr>
<td></td>
<td>Clearing land for cultivation</td>
</tr>
</tbody>
</table>

water, storing crops, dress making and tailoring, handicrafts of various kinds – are ‘economic’.

The own-account production of domestic and personal services by members of the household for their own final consumption remains totally excluded from the production boundary. Activities such as cleaning and decorating the house, preparing meals, the care, training and instruction of children, and the care of sick, infirm and elderly fall outside the production boundary. The reasons for not giving an economic value to unpaid domestic and personal services are mainly the total independence and isolation of these activities from markets and the difficulty in making a meaningful estimate of their monetary value.

**Population economically active**

The active population comprises all persons above a specified age who are employed or unemployed during the reference period. The employed includes all persons in ‘paid employment’ or ‘self-employed’, including unpaid family workers.

The length of the reference period and the time worked are critical criteria in the measurement of women’s work. Women always combine economic activities with work ‘outside SNA’ such as housework and the care of children, and are often engaged in economic activities part-time or seasonally.

The ILO standards allow for two different measures of the economically active population: the *usually active*, measured in relation to a long reference period, such as a season or a year, and the *currently active*, measured in relation to a short reference period such as one week or one day. For operational purposes, the minimum amount of time worked, required to be considered ‘currently active’ is at least one hour during the reference week. For the ‘usually active’ the criteria has to be decided on the basis of the circumstances of the country.

The currently active population is used to provide a picture of the population in a given moment in time, but does not reflect changes and fluctuations over a longer period. Seasonal patterns of activities and other changes in the labour force during a longer period can be measured only by using a longer reference period and adopting the concept of ‘usually active’.

In spite of all the efforts to improve international standards to better reflect women’s and men’s situations, women’s activities are still poorly measured for different reasons. Some countries use old concepts and definitions and pay little attention to the use of shorter or longer reference periods. Also, subsistence work – fetching wood and water, processing crops, keeping a vegetable garden, etc. – is very difficult to measure with ordinary data collection methods, even when concepts and definitions are adequately set.
Population non-economically active
As for the economically active, ILO standards cover two concepts for non-economically active: the population not usually active and the population not currently active. The two concepts reflect the two different approaches in the measurement of labour force, discussed above.

The population not currently active is measured over a short period of time and is classified on the basis of reasons for inactivity and not by status. This recommendation of considering the reason for inactivity rather than the status is an innovation and should help the reporting of students or homemakers as active whenever they engage in some economic activity during the reference period. In the past, the classification by status had contributed to underenumeration of those categorized as inactive by status who worked the minimum required to be economically active. According to the definitions of the Thirteenth ICLS, the classification of the reasons for inactivity is the following: 10
(a) attendance at educational institutions;
(b) engagement in household duties;
(c) retirement or old age;
(d) other reasons (i.e., infirmity).

Students or homemakers or other non-economically active persons who engage in any form of economic activity, even a minor one, for the minimum amount of time – one hour during the reference period – are classified as active. The ILO recommendation in this regard is often unknown or disregarded.

The population not usually active is measured over a longer period of time, usually one year, on the basis of the activity status of the individual. It includes all individuals who, during the specified reference period, were not employed or unemployed as their main status. 11 The not usually active population includes all individuals who were, during the reference period, mainly not active even if they engaged in some economic activity. The classification reflects the one seen above for the currently inactive and is as follows: 12
(a) students;
(b) homemakers;
(c) income recipients (pensioners, renters, etc.);
(d) others (children not at school, persons receiving public aid, etc.).

Status in employment
Almost everywhere, women and men have a different status in the labour force. In some countries, women tend to be excluded from wage and salary employment, while they are more numerous among contributing family workers. In other countries, there are few women employers, while the majority are employees.

The International Classification of Status in Employment (ICSE-93), adopted in January 1993 by the Fifteenth International Conference of Labour Statisticians, consists of the following groups: 13
- employees: workers who hold a paid employment job;
- employers: workers who, working on their own account or with one or more partners, hold a self-employment job, and in this capacity...
have engaged one or more persons to work for them as employees;

- **own-account workers**: workers who, working on their own account or with one or more partners, hold a self-employment job and have not engaged on a continuous basis any employees;

- **members of producers’ co-operatives**: workers who hold a self-employment job in a co-operative producing goods and services;

- **contributing family workers**: workers who hold a self-employment job in a market-oriented establishment operated by a related person living in the same household, but who cannot be regarded as a partner, because their degree of commitment, in terms of working time or other factors to be determined by national circumstances, is not at a level comparable to that of the head of the establishment;

- **workers not classifiable by status**: those for whom insufficient relevant information is available or who cannot be included in any of the preceding categories.

The 1993 Classification introduces the new category of ‘contributing family workers’ that replaces ‘unpaid family workers’.

The new definition introduces the concept of partners in the family enterprise, thus allowing women who work on an equal level with their husbands to be counted as own-account workers. In the past, only one member of the family was classified as own-account worker, while the others were regarded as unpaid family workers. This treatment was judged to be misleading and discriminatory against women, who often represent the majority of unpaid family workers. It was argued that when wives and husbands operated the family establishment together, they should both be classified as own-account workers.

The status of ‘contributing family workers’ (previously ‘unpaid family workers’) is of particular relevance to gender statistics, since women in this category are likely to be undercounted and their work confused with housework. The 1982 revision of the classification of status in employment tries to give more recognition to the contribution of women who work in family enterprises, often combining this work with other household tasks. The requirement that only persons working at least one-third of the regular working time had to be considered active was abolished, leaving with the unpaid family workers the same criterion as all other workers – i.e., one hour during the reference period.

### International Classification of Status in Employment (ICSE-93)

- employees
- employers
- own-account workers
- members of producers’ co-operatives
- contributing family workers
- workers not classifiable by status

The Fifteenth Conference of Labour Statisticians of January 1993 also suggests the use of a specific category for subsistence workers. **Subsistence workers** are defined as: ‘workers who hold self-employment jobs and in this capacity produce goods or services which are predominantly consumed by their own households and constitute an important basis for their livelihoods’. The idea of ‘important basis for livelihood’ is still vague and enumerators should be given precise criteria in this regard.

### Unemployment

Unemployment is a complex phenomenon and its definition and measurement give rise to considerable difficulties. The international definition of unemployment was revised by the Thirteenth Conference of Labour Statisticians in 1982. According to the new standard, the unemployed are ‘all persons above a specified age who during the reference period were

(a) without work, i.e., were not even for one hour in paid employment or self-employment as specified by the
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offices, unemployment agencies, etc. – and are often frustrated by social and cultural barriers when they intend to undertake concrete steps in looking for a job. In countries where the relaxation was applied, it has been observed that the criterion affected women more than men.

Informal sector

Discussion on the concept and importance of the informal sector started when policy makers and economists began to recognize that in many countries, this sector represented a large part of the labour force. In the beginning, employment in the informal sector was seen mainly as a temporary phenomenon, due to an excess of labour supply, composed of rural migrants who could not find work in the urban formal sector. Due to economic crises and policies of structural adjustment, work in the informal sector continued to increase and policy makers started to recognize its role in economic and social development.

Once the importance of the informal sector for the economy of many countries and its continuous and rapid growth were recognized (in a group of African countries, it is estimated to account between 19 and 51 per cent of the total non-agricultural production), the need for adequate definitions and measurement methods became urgent. Different definitions of the informal sector have been used in countries, stressing different aspects. The lack of a common standard and clear criteria for its measurement have created some confusion and comparability among countries is difficult.

Despite the efforts and attention of international organizations and concern about a better understanding of women’s work, for many years there were no standard definition or criteria for the measurement of the informal sector. However, the Thirteenth (1982) and Fourteenth (1987) Conferences of Labour Statisticians, recognized the importance of this sector and agreed...
that the distinction between formal and informal sectors should be on the basis of ‘characteristics of economic units, as opposed to individuals, households or occupations’.

In 1993, the Fifteenth International Conference of Labour Statisticians adopted a new resolution concerning statistics on the informal sector. Units operating in the informal sector are identified on the basis of the following characteristics:

- units operate at low level of organization, with little or no division between labour and capital as factors of production;
- units operate on small scale;
- labour relations, where exist, are based mostly on casual employment, kinship or personal and social relations;
- units have the characteristics of household enterprises where expenditure and capital goods for production are indistinguishable from expenditure and capital goods for the household.

An important distinction is also made between the concept of informal sector and the concept of hidden or underground economy where activities are carried out deliberately evading payment of taxes and social security or infringing labour regulations.

For statistical purposes, the informal sector is regarded as a group of units within the household sector, comprising two kinds of enterprises:

(a) informal own-account enterprises, household enterprises that do not employ any employees on a continuous basis;
(b) enterprises of informal employers, household enterprises that employ one or more employees on a continuous basis, but are considered informal according to one or more of the following criteria:
   - size of the unit below a certain level of employment;
• earnings paid to employees as compensation for work carried out in the production of goods and services (in the case of employees);
• returns from the sale of goods and services (in the case of self-employed);
• returns from the use of capital. Earnings paid to employees include wages and salaries, payment in kind, the goods and services furnished to employees free of charge or at reduced price, such as clothing, food or dwellings, and all other benefits.

In countries where agricultural production is predominant and carried out mainly at the household level, and the informal sector absorbs a large share

Measurement problems

In the previous section we saw how concepts and definitions can introduce biases, and how the lack of clear definitions on some particular issues affects the quality of data. But adequate concepts and definitions are not enough to produce all necessary statistics to address problems and goals in society. Many topics of special relevance to gender issues in society are difficult to quantify and measure. Here, we will mention some of the areas where, both for the lack of adequate methods and for the complexity of the topic itself, measurement presents problems.

Household composition

As discussed in the previous section, simply distinguishing between households headed by women and by men is not sufficient to study and understand household typologies and characteristics. The number of dependent children, the presence of different generations or of more than one family nucleus and all other characteristics and living arrangements largely affect people’s living conditions. Also, the head of the household does not represent the characteristics of the whole household and those of the individual members. Members of the same household may have different socio-economic characteristics and may not equally share resources and responsibilities.

New methodologies and approaches in measuring and analysing these characteristics are needed. A first step is to study household composition on the basis of the number, sex, age and relationships of the members, along with other socio-economic characteristics. Also, family relationships outside the household – such as children living apart from their biological parents – should be considered.

Infant mortality

In countries where civil registration is not developed, data on infant mortality are only available from censuses and surveys. Unfortunately, in data collection, it is very difficult to obtain reliable answers on this issue – answers on timing, age and sex of the child who died may all be affected. Also, the family deliberately tries to conceal the
death of girl children, where girl infanticide is still practiced.

Infant mortality rates are usually estimated for the total of boys and girls. Reliable estimates or data by sex do not exist in most developing countries.

**Maternal mortality**
Where administrative records are deficient, data on maternal mortality are not reliable. Many deaths occur in rural areas, far from hospitals and are not recorded. Also, many maternal deaths occurring in hospitals are erroneously registered under other causes rather than pregnancy and childbirth related causes.

Maternal mortality ratios are often estimated on the basis of small scale studies or evaluations, but they seldom provide a correct measurement of the phenomenon.

**Access to safe water**
Access to safe water is generally measured by household surveys or population and housing censuses. Reliable data and accurate information on different sources are difficult to obtain. Often, not all sources and their distances from the dwelling are considered in questionnaires and even when they are, the respondent might not be able to indicate the actual distance of the source. Also, in some countries data are only available from the census, which means only every 10 years or more.

**Internal migration and international migration**
Data on internal migration are obtained from population censuses, surveys and population registers. In countries where population registers do not exist or exist but migration movements are not adequately registered, the only sources of information are censuses or surveys.

In data collection, female migration is likely to be underestimated. In some cases, enumerators interview only male heads of household or only those they presume are economically active – which often means excluding women.

Biases may also be associated with the respondents’ perception of what is socially acceptable. Where it is considered inappropriate for a woman to migrate, unless it is to follow her husband, women’s migration is likely to be underreported. Finally, domestic workers – often women who migrated from rural areas – are not interviewed directly and therefore underreported.

Studies on internal migration generally focus on migration to cities and to long distances, so that available data are tabulated by region or province, overlooking migration movements to shorter distances. Since women are more likely to migrate shorter distances and between rural areas, rather than to urban areas, their movements are underestimated in official statistics.

Data on international migration are derived from censuses and surveys, with all the problems seen for internal migration. In addition, since most countries today have regulations to restrict immigration, an increasing number of women and men migrate illegally and go uncounted. Undocumented migration is very difficult to quantify and existing estimates are often not by sex. Data on the foreign born population, available from censuses and surveys and used to quantify international migration, are often not tabulated by sex.

**School enrollment**
School enrollment is intended to provide a measure of the educational achievement of the population. In countries where literacy and educational achievement of women and men are very different, it is crucial to produce reliable data on school enrollment for policy and planning purposes. However, data on enrollment provided by schools or educational authorities are seldom representative of the reality, since they do not take into account rates of absenteeism, repetition and dropout that are very different for girls and boys.

Enrollment ratios, often used as the only indicator of gender differentials in
educational achievement, are not always a reliable measure. Where drop-outs, absenteeism and repetition are frequent, the number of reported enrollees is higher than the actual one. In addition, the number of children in the school-age cohort used in the denominator is underestimated, because where schools are not attended regularly, children enroll at school at different ages than the fixed age cohort of one particular level.

Dropouts and absenteeism are generally higher among girls, because of early pregnancies, lack of transportation, early engagement in work in the family farm, or other social and cultural barriers that obstruct girl’s access to educational facilities.

Paid and unpaid work
The measurement of women’s and men’s paid and unpaid work is a crucial area in gender statistics. In the previous section, we have seen problems related to concepts and definitions and how these affect measurement.

When concepts and definitions are applied correctly, the measurement of paid work is generally reliable. The measurement of unpaid work instead is more complex. There are two main aspects:

- unpaid work within the production boundary of SNA – which is in large part subsistence work carried out within the household – is included in concepts and definitions of economic activity but is very hard to measure in reality with conventional data collection methods;
- unpaid work outside the production boundary of SNA – all housework tasks, including the care of children and other members of the household – is not ‘economic’ and therefore never measured in surveys and censuses (except in time use studies).

The distinction between subsistence work and housework is not so easily made in reality. Women engage in both types of work and cannot distinguish between what is economic and what is not, especially when both types of work are carried out with the same tools, at the same location and some times simultaneously. In the measurement of subsistence work other factors intervene, including the formulation of questions, gender stereotypes, the way women see their work, the training of the enumerators and the selection of respondents. (See also section on Data quality).

Time use
Time use studies represent an alternative to traditional methods of measurement of paid and unpaid work. Time use statistics measure what women and men do, by recording in sequence for each individual, all activities over some fixed period of time, usually one or two days. Different activities can then be grouped in paid and unpaid, in subsistence and housework, or any other classification useful in gender analysis. Time use statistics also provide information on other aspects of women’s and men’s lives, including how they share family responsibilities, use their free time and participate in educational activities.

In time use studies, data are usually collected on the amount of time spent on each activity performed, whether the individual was alone or with others, where the activity was performed, for whom, and whether other activities were performed simultaneously. Methods of data collection are: direct observation; interviews where the respondent has to recall activities performed the day before or during a reference period; and respondent record-keeping, usually on a diary where the respondent has to record all activities performed over a span of time (usually a day or a week).

Data collection in time use is complicated. The compilation of the diary requires a significant effort by the respondent, who has to understand the method and be literate. In interviews, respondents often do not have the right perception of time and cannot recall exactly what they did during the reference period. The fact that many of the
activities performed are simultaneous, or the limit between activities is not clear, further complicate data collection. Analysis and presentation of data are also difficult and require a developed statistical system and adequate software and hardware.

Several methods have been experimented within countries and despite technical problems and some approximations, time use studies have aroused great interest. Increasingly, national statistical bureaus are turning to such studies to provide data to measure unpaid work and for a variety of other purposes.

### List of activities adopted in the harmonized European time use survey

- Personal care
- Gainful employment
- Study
- Household and family care
- Organizational activity
- Social life and entertainment
- Sports participation
- Hobbies and crafts
- Mass media
- Travel and unspecified time use

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### Agricultural labour

One of the main problems in agriculture and rural development is the lack of accurate gender statistics. Many of the aspects related to agricultural work and rural life are difficult to measure. In developing countries, the production is mainly carried out at the household level, so that agricultural holding and household unit are often confused in data collection. In this situation, it may be difficult to identify the holder, especially when two or more members of the household operate different holdings or when two or more members of the household jointly operate one holding. In general, women tend to lose their 'holder status' in both cases: in the first case – defined as 'multiple holdings' – only one holding is identified, the largest, and one holder, often the male member of the household; in the second case – defined as ‘joint holders’ – usually only the senior holder is identified, who is again the male member of the household.

Further problems arise from the omission of small holdings from agricultural surveys and censuses. These holdings are often excluded from the basic frames used in surveys and censuses for practical reasons or for lack of resources. Since women more often operate these holdings, while men operate larger holdings, they are more likely to be underenumerated.

Work in agriculture, especially in countries where the agricultural sector is predominant, is carried out on a household basis, or with the contribution of occasional or temporary labourers. In these situations, records of the number and sex of people employed are often deficient.

Data collection in this area is also affected by the measurement problems discussed above (see sections on **Economic activities** and **Paid and unpaid work**).

### Access to resources

Access to resources is in general unequal between women and men and among different social groups. By access to resources it is usually meant the individual possession of productive resources and properties and, in broader terms, also the individual access to other facilities that can improve income and productivity, such as training and extension services in agriculture.

In countries where a large share of people work in agriculture, access to land represents a critical issue. Data on access to land may be collected in agricultural censuses and surveys,
although these data generally refer only to the holder of the agricultural holding, overlooking other members of the household, and are seldom tabulated by sex.

Similar problems arise in the measurement of women’s and men’s access to means of production – such as equipment, technology, irrigation and drainage facilities, etc. Data usually refer to the holding or the holder and do not provide information on the single members of the household/agricultural holding.

Access to credit
Traditionally men have easier access to formal channels of credits while women, because of social and legal barriers, have often to rely on money lenders, informal organizations or relatives. In general it is difficult to obtain reliable information on this topic. People are reluctant to talk about their management of money and women may be particularly unwilling to discuss this matter especially in front of male members of the family. Moreover, it is sometimes difficult to disaggregate this information by members of the household, especially where budgets are not clearly separated.

Data on credit come also from financial institutions and other organizations that formally or informally lend money, especially to micro-entrepreneurs and low-income people.

Individual and household income
The measurement of both individual and household income is very complex, especially in countries where most people are self-employed and work in the informal sector and in household based enterprises.

The main problems relate to:

- the identification of different sources of income, including income in kind;
- conceptual difficulties in assigning a value to production for own consumption;
- difficulties in obtaining information from small businesses and establishments in the informal sector where workers do not keep accounts;
- methodological problems in obtaining information through surveys and in the analysis of the results.

In many countries, women are less likely than men to be in wage employment (in several African countries less than 10 per cent of economically active women are wage earners20). Also, women work more often as unpaid family workers, or in the informal sector and in subsistence agriculture. In all these situations, it is more difficult to measure women’s incomes and returns of work, including non-monetary exchanges.

In the measurement of household income all sources for each member should be considered, including income from employment, interests, dividends, rent and social security benefits. As for individual income, many conceptual and methodological problems arise. In addition, when members of the household are absent – which is very often the case in polygamous marriages and in countries with high male migration – it is always unclear whether the income of the absent members should be included or not.

Violence
Violence in all its forms is very difficult to quantify and measure. Many crimes are not reported and criminologists regard domestic violence against women as the most unreported crime. Even when violence is reported, ways of recording data are very often inefficient. For example, the relationship between the victim and the perpetrator is often not reported, making it impossible to distinguish intimate assaults from those perpetrated by a stranger. Collection of information through surveys is also very complex, since people are very reluctant to talk about violence they have suffered, especially when this is inflicted by a family member. The qual-
ity of the information collected varies significantly with the way the question is formulated, the level of training of the interviewer and the presence of other family members during the interview.

**New concerns in gender statistics and data gaps**

As seen in the previous section, problems with concepts and definitions and methodological difficulties in data collection result in the lack of statistics in certain areas. Some of the statistics regularly collected cannot be used to address gender issues because concepts, definitions and methods used in data collection are not adequate. Also, some topics are not covered by regular data collection programmes because of the lack of communication between users and producers of data, the poor understanding of some areas of concern and in some cases the lack of resources.

Today, new concerns are also emerging. Policy makers have become more aware of gender issues and the need for statistics. Interest in gender statistics comes from users at different levels and relates to a wider range of issues than before. More attention is given to the relationships between women and men in society, and the sharing of responsibilities within the household and the community. There are new concerns in gender analysis where little is known or investigation has just begun and data are needed to better understand the causes and effects. Other topics have been investigated on a smaller scale (i.e., small surveys and studies) because official statistics produced on a larger scale were scarce.

The following is a list of topics where data are particularly scarce.

- Male fertility
- Household composition and structure
- Diseases and causes of death
- Internal and international migration
- School dropout rates
- Educational achievement
- Fields of higher education
- Access to credit
- Access to land
- Informal sector
- Subsistence agriculture
- Unpaid work
- Time use
- Individual and household income
- Income control
- Poverty
- Violence against women/domestic violence
- Economic decision making
- Decision making at the local level
- Decision making in the household
- Resources allocation within the household
# Data availability and quality

In the previous chapter we have seen how to identify statistics and indicators relevant to specific problems and concerns and necessary to address gender issues in society. The next step is to assess the availability and quality of these data.

In the example presented some of the problems that may affect the quality of gender statistics are shown for a few of the indicators identified in Chapter 3. It is important to note that only a few examples of the possible problems and sources of error are shown.

## Example

### Data availability and quality

<table>
<thead>
<tr>
<th>Indicator</th>
<th>Sources of error</th>
<th>Problems with concepts, definitions, classifications</th>
<th>Measurement problems</th>
<th>Data gaps</th>
</tr>
</thead>
<tbody>
<tr>
<td>Time spent in paid/unpaid work by marital status</td>
<td>Compilation of diary in time use survey</td>
<td>Categories used in marital status not always reflect the reality</td>
<td>Very difficult to capture overlapping activities</td>
<td>Only few countries regularly collect time use data</td>
</tr>
<tr>
<td>Employed population by marital status and age</td>
<td>Categories used in marital status not always reflect the reality</td>
<td></td>
<td></td>
<td>Data are collected in LFS/census but seldom tabulated</td>
</tr>
<tr>
<td>Economically/non-economically active pop. by marital status and number of children</td>
<td>Formulation of questions, Enumerators’ and respondent’s attitude, Reference period</td>
<td>Definition of econ. active Categories used in marital status</td>
<td>Very difficult to capture unpaid work</td>
<td>Data are collected in LFS/census but seldom tabulated</td>
</tr>
<tr>
<td>Enrollment rates at primary level</td>
<td>Lack of information on dropout, repetition and absenteeism</td>
<td></td>
<td>Ages of enrollees in the numerator cover a much wider span than the cohort used in the denominator</td>
<td></td>
</tr>
<tr>
<td>Illiteracy rates</td>
<td>Enumerators wrongly apply the criteria to define a literate/illiterate person</td>
<td></td>
<td>Literacy rates are updated only on the basis of census/literacy surveys that are not frequent</td>
<td></td>
</tr>
<tr>
<td>Dropout rates by reason in public/private schools</td>
<td></td>
<td></td>
<td>Data on reason for dropping out are only available from specific surveys</td>
<td></td>
</tr>
<tr>
<td>Average age at first marriage</td>
<td>Wrong reporting of exact age at marriage by the respondent</td>
<td>Estimates refer to the historical period covered by the age groups considered and not to the ones currently marry</td>
<td>Where no civil registration data available, only estimates can be done on the basis of census data</td>
<td></td>
</tr>
</tbody>
</table>
5. Analysis and Presentation of Gender Statistics

Timely, reliable and gender related data are an indispensable basis to promote and monitor change, and to inform the public and policy makers. To ensure that statistics and indicators are correctly used and reach a large audience, data must be prepared and presented in accessible formats and in ways suited to the needs of the users. The way data are presented is crucial for a correct use and interpretation of the data themselves. Tables and graphs should provide clear messages, attract readers, encourage further analysis and stimulate demand for more information.

Showing gender differentials in data

Data are often presented in ways that are difficult to read, especially for non-statisticians, and unattractive. Data are compiled in large tables, with insufficient explanation. Table headings might be confusing and the definition of the indicators unclear or missing.

The way data are presented can also be inaccurate and misleading: when missing data are not clearly footnoted, when figures are not appropriately rounded, when different scales are used in charts, and in a number of other situations when the presentation is not appropriate for the kind of data being used.

Statistics can be made interesting and useful to greater numbers of users by simply adopting some criteria in the preparation of tables and charts. Tables can be made simple and attractive. Definitions and analysis can be presented in clear words and guide the reader through tables and charts. Data presented in a simple format, with the adequate information on concepts and definitions can reach a larger number of users and be of greater utility.

In gender statistics, analysis and presentation are particularly important since it is sometimes difficult to show gender differentials, especially to users not familiar with statistics. The choice of indicators and measures of statistical distributions to be used in data analysis and presentation is crucial for the correct interpretation of the data.

In the following we discuss some of the ways statistical distributions can be presented and compared, with special reference to problems related to presentation of gender statistics.
There are two basic types of data:
- qualitative
- quantitative

Occupation is a qualitative variable.

The number of children is a discrete quantitative variable.

Income is a continuous quantitative variable.

Ratios make distributions with different dimensions comparable.

Data
We can distinguish two basic types of data: **qualitative** and **quantitative**. Qualitative data are also called **categorical**, since the qualitative characteristic is not numerically measured but classified in categories. Quantitative data are also called **measurement data**, because the characteristic is measured on a numerical scale. Numerical variables can be further distinguished into two types: **discrete**, when the variable takes distinct values and **continuous**, when the variable can take any value in an interval.

Quantitative data can be presented in classes, with frequencies indicated for the whole class. The width of the class interval is very important for the clarity and simplicity of the presentation. A large number of classes is difficult to present and analyse and in some cases does not illustrate effectively certain phenomena. On the other hand, since we do not know the distribution of the units observed within the class, broad class intervals lose much of their information content.

In presenting gender statistics, covering all spheres of society, we deal both with qualitative variables, such as employment status, fields of education, causes of death, etc. – and quantitative – such as age, household size or income.

**Absolute values and proportions**

The frequencies observed can be presented as absolute values or relative to a total (**relative frequencies** or **proportions**). The total can be either the total of the units observed or a larger population to which the units observed belong. For example, the number of women residing in a service house, in the age group 65–74 can be presented as the proportion of the total number of women in the service house or as a proportion of the total number of women in the age group 65–74 in the country. In the second case the proportion is also called ‘derivation’ ratio, that is the ratio between the observed units with the specified characteristic and the originating population.

The **sex distribution** within a group is another example of the first case of proportions. The proportion (percentage) of women and the proportion (percentage) of men in a group, e.g. residents in the age group 65–74 in a service house, always add up to one hundred per cent.

**Ratios and rates**

**Ratios** are very useful when comparing distributions with different dimensions: the dimension is eliminated by the ratio and distributions become comparable.

Two types of ratios correspond to the proportions seen above and are called **composition ratio** when calculated for the total of the units observed and, as we have seen, **derivation** when calculated for the originating population. Generally, ratios calculated between the number of events occurring during a specified period of time, and the population exposed to the event are referred to as **rates**. Examples of rates are birth rates, infant mortality rates, maternal mortality rates, labour force participation rates, etc. In the case of maternal mortality, when the originating population – that is the number of pregnant women – is not available, the indicator is calculated on the number of live births, and is more accurately called maternal mortality ratio.

The **co-existence ratio** is used to express the imbalance between two phenomena occurring at the same time or between two groups of the population. It is used to show the imbalance in the number of women and men with a certain characteristic, to relate the number of immigrants to the number of emigrants, or the total import to the total export, etc. The sex ratio at birth for example expresses the number of girls (or boys) born per 100 boys (or girls respectively).

An important group of ratios is represented by the **variation ratios**, or **growth rates**. These ratios illustrate the
relative variation between two values. The population growth rate is, for example, a variation ratio that expresses the variation in the size of the population at two different moments.

Ratios between values that vary over time or over space are called indexes. A time index is the ratio between observations at two different moments. A spatial index is the ratio between observations in two different areas.

The index is useful to refer observations at different moments – a time series – or in different areas – a spatial series – to one observation taken as a reference value, at a specific moment or a specific area. It is possible to refer the whole distribution to the same reference value, or change the reference value for each term of the distribution. In a time series, for example, we can refer every value to a specific year or relate the value of each year to the value of the year before.

Measures of central tendency
The measures of central tendency – mode, median, arithmetic mean, geometric mean and harmonic mean – provide different ways of measuring the average for a series of observations.

The mode is the most frequently occurring value or class of values in the distribution. The distribution can be uni-modal, bi-modal or multi-modal.

The median is the value that divides a set of ranked observations into two groups of equal size. One common indicator based on the median is the median age of the population.

The concept of median can be generalized, obtaining quartiles and percentiles. Quartiles divide the distribution into four equal parts and percentiles in ten parts. These measures are often used in presenting income distributions.

The arithmetic mean is the simplest and most common measure calculated in a series of data. It is very often used with demographic data, to give the average age of the population. A number of very common indicators are calculated as arithmetic means. The mean can be weighted, when weights are assigned to each unit.

The geometric mean and harmonic mean are used in particular cases when the data are in geometric progression and when data relate to movement or growth, respectively.

Measures of dispersion
Measures of dispersion describe the variability of data and are important in statistical analysis. Among measures that can be calculated in a distribution we mention the following: the range, the interquartile range, the mean deviation, the standard deviation, the variance, the coefficient of variation and the relative variance.

The range is the difference between the largest and the smallest value. It is a very rough measure that tends to be too sensitive to extreme values and is not popular among statisticians.

The interquartile range – the difference between the third and the first quartile – and the 10–90 or 20–80 percentile ranges are seldom used.

The mean deviation is the arithmetic mean of the absolute deviations of a set of observations from their mean.

The most common and most important measure in all kinds of statistical analysis is the variance. The variance is calculated as the mean of the deviations of values from the mean, raised to the power of two. The standard deviation is the square root of the variance.

For the comparison of different data distributions, it is useful to standardize the variability measures. The measures used most are the coefficient of variation – mean deviation divided by the mean – and the relative variance – variance divided by the mean to the power of two.
### Some indicators of interest in gender statistics

<table>
<thead>
<tr>
<th>Indicator</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Mean age of the population</strong></td>
<td>Mean of the ages weighted with the population of each age group.</td>
</tr>
<tr>
<td><strong>Median age of the population</strong></td>
<td>The age that divides the population exactly in two equal parts.</td>
</tr>
<tr>
<td><strong>Dependency ratio</strong></td>
<td>Ratio between the population that has responsibility not self-sufficient due to age – young and elderly people – and the population that has responsibility to support them. It is usually calculated as the ratio between the population aged 0–14 and aged 65 and over, and the population aged 15–64.</td>
</tr>
<tr>
<td><strong>Crude birth rate</strong></td>
<td>Number of births in a population during the year, divided by the mid-year population. It is usually expressed as births per 1,000 population.</td>
</tr>
<tr>
<td><strong>Crude death rate</strong></td>
<td>Number of deaths in a population during the year, divided by the mid-year population. It is usually expressed as deaths per 1,000 population.</td>
</tr>
<tr>
<td><strong>Maternal mortality ratio</strong></td>
<td>Number of maternal deaths divided by the number of live births in a given year. It is expressed as number of deaths per 100,000 live births.</td>
</tr>
<tr>
<td><strong>Total fertility rate</strong></td>
<td>Average number of children that would be born to each woman if all women lived to the end of their childbearing years and fertility patterns of a given period did not change. The measure gives the total number of children an average woman will bear in her lifetime in the absence of mortality.</td>
</tr>
<tr>
<td><strong>The following indicators are usually calculated for women and men separately:</strong></td>
<td></td>
</tr>
<tr>
<td><strong>Age-specific mortality rate</strong></td>
<td>Number of deaths occurring during a specified period to persons of a specified age or age group, divided by the mid-year population of that age or age group.</td>
</tr>
<tr>
<td><strong>Life expectancy at birth</strong></td>
<td>Average number of years that a member of a cohort of births would be expected to live if the cohort were subject to the mortality conditions expressed by a particular set of age specific mortality rates.</td>
</tr>
<tr>
<td><strong>Infant mortality rate</strong></td>
<td>Number of deaths of children under one year of age per 1,000 children born alive.</td>
</tr>
<tr>
<td><strong>Child mortality rate</strong></td>
<td>Number of deaths of children between age of one and five per 1,000 children of age one.</td>
</tr>
<tr>
<td><strong>Under five mortality rate</strong></td>
<td>Number of deaths of children between birth and age five per 1,000 children born alive.</td>
</tr>
<tr>
<td><strong>Migration rate</strong></td>
<td>Number of migrants during a year (or a specified period of time) divided by the population exposed to migration (usually the population of mid-year).</td>
</tr>
</tbody>
</table>
Singulate mean age at marriage
Average age at first marriage of those ever married in the population aged 15 to 50, calculated on the basis of the proportions of never married in each five-year age group between 15 and 50. It gives the average age at first marriage over the historical period covered by the age group 15–50 rather than actual average of those currently marrying for the first time. The singulate mean age at marriage is commonly used instead of the actual average age at marriage, when civil registration is not available.\(^1\)

Illiteracy rate
Number of illiterate persons divided by the total population. It is expressed as a percentage. Illiteracy rates are usually calculated for specific age groups: 15–24, to show the effects of the ‘current’ situation in education and 25 and over or older ages, to show the effects of ‘historical’ deficits in education.

Enrollment rate
Number of children enrolled at school at a specified level, divided by the number of children in the school age cohort.

Economic activity rate
Number of persons economically active above a specified age divided by the population of the same age. Economic activity rates may also be calculated for specific age groups – five- or ten-year groups or broad groups like 15–24, 25–49, 50–65 – to show the economic participation level over the life cycle.

Unemployment rate
Number of persons in the labour force who are unemployed divided by the total labour force. It is expressed as a percentage. Unemployment rates may also be calculated for specific age groups to show the level of unemployment over the life cycle and to identify the age groups – often the newly entered in the labour force – most affected.

Construction of Tables and Charts

From gender-blind to gender-sensitive presentation

The construction of tables and charts to present information on women and men follows the general rules for statistical presentation. In addition, we have to remember that the presentation should facilitate comparison between women and men and highlight gender issues. From detailed statistics collected through censuses, surveys and administrative registers, we compile tables and prepare charts. Each of them will contain a main message, be user friendly and make the reader aware of gender differentials and issues.

A. Population ages 10 and over in the labour force by area in Pakistan 1991–92
Proportion (%) of all persons in the age group (LFPR)

<table>
<thead>
<tr>
<th>Area</th>
<th>LFPR</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rural</td>
<td>45</td>
</tr>
<tr>
<td>Urban</td>
<td>38</td>
</tr>
<tr>
<td>Total</td>
<td>43</td>
</tr>
</tbody>
</table>


Traditionally, statistics on individuals to a large extent have been presented gender-blind, that is only as totals with no information on women and men. For example, Table A gives information on labour force participation rate (LFPR) for the population in rural and urban areas in Pakistan 1991–92. Both women and men are invisible.

B. Women ages 10 and over in the labour force by area in Pakistan 1991–92
Proportion (%) of all persons in the age group (LFPR)

<table>
<thead>
<tr>
<th>Area</th>
<th>LFPR</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rural</td>
<td>17</td>
</tr>
<tr>
<td>Urban</td>
<td>8</td>
</tr>
<tr>
<td>Total</td>
<td>14</td>
</tr>
</tbody>
</table>


When the discussion on women’s situation in development started, statistics were often presented on women only, as in Table B.

C. Population ages 10 and over in the labour force by area in Pakistan 1991–92
Proportion (%) of all persons in the age group (LFPR)

<table>
<thead>
<tr>
<th>Area</th>
<th>Total</th>
<th>Women</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rural</td>
<td>45</td>
<td>17</td>
</tr>
<tr>
<td>Urban</td>
<td>38</td>
<td>8</td>
</tr>
<tr>
<td>Total</td>
<td>43</td>
<td>14</td>
</tr>
</tbody>
</table>


Alternatively, an extra column with statistics on women was added to the gender-blind total, as in Table C. It is, however, difficult to compare statistics on women with that of a total, in which women are already included.
If the purpose is to show that women are a special group, a deviator, the question is: A deviator from what? To answer this question, comparisons have to be made between women and men. Such comparisons are impossible in Tables A–C since men are invisible.

Relevant tables for a gender analysis – a study of similarities and differences between the sexes – are D and E below. Women and men must be visible side by side for all characteristics and sub-groups of relevance for the issue raised. In fact, the last column with the total in Table D can be omitted as in Table E.

Fourteen per cent of all women ages 10 and over are economically active compared to 70 per cent of all men in the same ages. The LFPR is higher for both women and men in rural than in urban areas. Only 8 per cent of all women in urban areas are in the labour force compared to 66 percent of all men.

Comparisons between women and men are much easier to do in graphical presentations than in tables. Chart F illustrates the information given in Table E.

<table>
<thead>
<tr>
<th>Area</th>
<th>Women</th>
<th>Men</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rural</td>
<td>17</td>
<td>75</td>
<td>45</td>
</tr>
<tr>
<td>Urban</td>
<td>8</td>
<td>66</td>
<td>38</td>
</tr>
<tr>
<td>Total</td>
<td>14</td>
<td>70</td>
<td>43</td>
</tr>
</tbody>
</table>


The gender-blind total can often be deleted.
Cross-tabulation

In the analysis and presentation of gender statistics we generally deal with cross-tabulated (or cross-classified) data. Data, presented in a two-way frequency table, refer to one characteristic (status in employment, age groups, educational level, place of living, etc.) presented for women and men (see example above).

Depending on the specific context, cell frequencies are also presented relative to a marginal total (row or column). Relative frequencies by row or by column show a different dimension of the data. It is important to chose the one relevant to gender issues and conduct the correct analysis from the table. It is not uncommon to find in statistical publications two- or three-way tables where proportions are incorrectly presented and interpreted.

Basic table for gender analysis

Very detailed information on women and men, so called ‘raw data’, from databases, outprints on data sheets or from statistical publications is often the starting point for gender analysis. To facilitate analysis and presentation, ‘basic tables’ should be compiled for the statistics identified as relevant for gender analysis.

In a typical table, where one characteristic (by row) is presented for women and men (two columns), proportions can be calculated by column – that is on the total of women or men respectively – or by row – that is on the total population of women and men in each category.

In the first case – proportions calculated by column – the figure represents the percentage of women with a certain attribute within the total of women, or the percentage of men with a certain attribute within the total of men, showing the distribution of women and men, respectively, according to the variable in question.

In the second case – proportions calculated by row – the figure represents the percentage of the total population with a certain characteristic who are women or men, respectively, showing the sex distribution within a certain category.
Both types of information are useful in the presentation of gender statistics and necessary for a complete picture of the situation. In the analysis of occupational segregation, for example, it is important to look at the percentage distribution of economically active women/men by occupational group, to see in which occupations women/men concentrate; but it is also necessary to look at the share of women/men in each occupational group to determine the ones female/male dominated.

Since in gender statistics the stress is on similarities and differences between women and men, it is in general a good rule to have data on women and men side by side, rather than separated into three different tables – women, men and total. When necessary, different tables can be presented for different years, geographical areas, etc.

The basic table is illustrated with statistics on educational level in China.

---

**Population ages 15 and over by educational level in China 1990**

Numbers in 1,000’s, percentage distribution and sex distribution (%)

<table>
<thead>
<tr>
<th>Educational level</th>
<th>Women Number</th>
<th>Women Per cent</th>
<th>Men Number</th>
<th>Men Per cent</th>
<th>Sex distribution</th>
</tr>
</thead>
<tbody>
<tr>
<td>Illiteracy</td>
<td>127,249</td>
<td>32</td>
<td>54,360</td>
<td>13</td>
<td>70 30</td>
</tr>
<tr>
<td>Primary</td>
<td>134,670</td>
<td>34</td>
<td>147,837</td>
<td>35</td>
<td>48 52</td>
</tr>
<tr>
<td>Junior middle</td>
<td>96,773</td>
<td>24</td>
<td>151,072</td>
<td>36</td>
<td>39 61</td>
</tr>
<tr>
<td>Senior middle</td>
<td>27,933</td>
<td>7</td>
<td>44,581</td>
<td>11</td>
<td>39 61</td>
</tr>
<tr>
<td>Technical secondary</td>
<td>7,146</td>
<td>2</td>
<td>10,126</td>
<td>2</td>
<td>41 59</td>
</tr>
<tr>
<td>College</td>
<td>3,059</td>
<td>1</td>
<td>6,560</td>
<td>2</td>
<td>32 68</td>
</tr>
<tr>
<td>University</td>
<td>1,720</td>
<td>0</td>
<td>4,419</td>
<td>1</td>
<td>28 72</td>
</tr>
<tr>
<td>Total</td>
<td>398,552</td>
<td>100</td>
<td>418,957</td>
<td>100</td>
<td>49 51</td>
</tr>
</tbody>
</table>

Source: 1990 Population Census. China

---

32 per cent of all women and 13 per cent of all men ages 15 and over are illiterate in China 1990.

3,059,000 women and 6,560,000 men ages 15 and over have college as the highest educational level in China 1990.

The sex distribution among persons ages 15 and over with university education in China 1990 is 28 per cent women and 72 per cent men.

---

Sex should be a superior classification in all statistics related to individuals.
From ‘raw data’ to easily understood gender statistics

In close cooperation statisticians, policy makers and planners have identified statistics and indicators necessary in the work with gender concerns. Statisticians have compiled available statistics and are responsible for a user friendly presentation. In doing this, gender concerns should be kept in focus.

A choice of tables and graphs must be made from the ‘raw data’, the detailed statistics available.

The process from ‘raw data’ to analysis and presentation of such statistics is illustrated with statistics from Tanzania. The gender concern to be addressed is poverty, one of the most urgent gender issues worldwide. It is also an important gender issue in the Beijing Platform for Action. One of the underlying causes for poverty is the lack of means of economic support. Analysis during the preparation for the Beijing Conference showed that women all over the world have fewer opportunities than men to support themselves economically.

To closer analyse the economic situation of women and men, statistics are needed on economic activities and reasons for not being economically active. For many countries such statistics can be found in labour force surveys or population censuses. In Tanzania detailed information on the number of women and men in various categories are found in the labour force survey publications.

Firstly, a basic table on economic activity status is compiled from the detailed statistics. Exact numbers are rounded to 1,000's and percentages to integers.

The basic table can further be simplified by deleting the two columns with numbers and adding the total number of women and men under the columns with percentage distributions.

### Basic table 1

#### Population ages 10 and over by economic activity status and reasons for not economically active in Tanzania Mainland 1990/91

<table>
<thead>
<tr>
<th>Status</th>
<th>Number</th>
<th>Women</th>
<th>Men</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Economically active</td>
<td>5,674,626</td>
<td>5,620,301</td>
<td>11,294,927</td>
<td></td>
</tr>
<tr>
<td>Not economically active</td>
<td>2,327,291</td>
<td>1,978,022</td>
<td>4,305,313</td>
<td></td>
</tr>
<tr>
<td>of which</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Housework</td>
<td>366,997</td>
<td>142,350</td>
<td>509,347</td>
<td></td>
</tr>
<tr>
<td>Student</td>
<td>1,399,348</td>
<td>1,512,705</td>
<td>2,912,053</td>
<td></td>
</tr>
<tr>
<td>Too old</td>
<td>211,826</td>
<td>90,376</td>
<td>302,202</td>
<td></td>
</tr>
<tr>
<td>Sick</td>
<td>238,224</td>
<td>139,630</td>
<td>377,854</td>
<td></td>
</tr>
<tr>
<td>Disabled</td>
<td>37,317</td>
<td>41,309</td>
<td>78,618</td>
<td></td>
</tr>
<tr>
<td>Others</td>
<td>73,579</td>
<td>51,660</td>
<td>125,239</td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>8,001,917</td>
<td>7,598,323</td>
<td>15,600,240</td>
<td></td>
</tr>
</tbody>
</table>


#### Basic table 1

<table>
<thead>
<tr>
<th>Status</th>
<th>Number</th>
<th>Women</th>
<th>Men</th>
<th>Sex distribution</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Women</td>
</tr>
<tr>
<td>Economically active</td>
<td>5,675</td>
<td>71</td>
<td>620</td>
<td>74</td>
</tr>
<tr>
<td>Not economically active</td>
<td>2,327</td>
<td>29</td>
<td>1,978</td>
<td>26</td>
</tr>
<tr>
<td>Total</td>
<td>8,002</td>
<td>100</td>
<td>7,598</td>
<td>100</td>
</tr>
</tbody>
</table>


#### Population ages 10 and over by economic activity status

<table>
<thead>
<tr>
<th>Status</th>
<th>Percentage distribution</th>
<th>Sex distribution</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Women</td>
<td>Men</td>
</tr>
<tr>
<td>Economically active</td>
<td>71</td>
<td>74</td>
</tr>
<tr>
<td>Not economically active</td>
<td>29</td>
<td>26</td>
</tr>
<tr>
<td>Total, per cent</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td>numbers in 1,000's</td>
<td>8,002</td>
<td>7,598</td>
</tr>
</tbody>
</table>

In addition, economic activity rates can be presented in a graph. The table at the left side and the graph to the right show that 71 per cent of all women and 74 per cent of all men ages 10 and over are in the labour force. The sex distribution among persons economically active is even, but among those not in the labour force, 54 per cent are women and 46 per cent are men.

Twenty-nine per cent of all women and 26 per cent of all men ages 10 and over are not economically active. What are the reasons for not being economically active? Basic table 2 is compiled to answer this question.

This basic table is further simplified in the same way as the first basic table. In the new table, the reasons are ranked after the percentage of women in the group to improve the analysis of sex distribution for each reason. The percentage distribution by reasons for women and men is also illustrated graphically.

The most common reason that both women and men are not economically active is studies. Sixty per cent of all women and 76 per cent of all men not in the labour force are students. The second most common reason for both women and men is housework, 16 per cent of all women compared to 7 per cent of all men.

The most skewed sex distribution among all reasons is found for persons who do housework. Seventy-two per cent are women and 28 per cent men.

A deeper analysis of women’s and men’s economic and non-economic activities should include additional background variables, e.g., age, rural/urban, education and family situation.
Making statistics easier to understand

In the following, recommendations are given for a user friendly presentation of tables and graphs. The recommendations are illustrated with examples. In many examples we go from ‘not recommended’ to better presentations. Statistics from countries all over the world are used for these illustrations. This should not, however, suggest that the data are presented in the ‘not recommended’ way in the sources.

### Recommendation 1

Round off numbers to facilitate comparisons between women and men.

#### A. Population in Namibia by region 1991

<table>
<thead>
<tr>
<th>Region</th>
<th>Number</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Women</td>
<td>Men</td>
<td></td>
</tr>
<tr>
<td>Omusati</td>
<td>106,296</td>
<td>83,623</td>
<td></td>
</tr>
<tr>
<td>Ohangwena</td>
<td>99,469</td>
<td>80,165</td>
<td></td>
</tr>
<tr>
<td>Oshana</td>
<td>73,340</td>
<td>61,544</td>
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</tr>
<tr>
<td>Okavango</td>
<td>61,067</td>
<td>55,763</td>
<td></td>
</tr>
<tr>
<td>Oshikoto</td>
<td>66,766</td>
<td>61,979</td>
<td></td>
</tr>
<tr>
<td>Caprivi</td>
<td>46,357</td>
<td>44,065</td>
<td></td>
</tr>
<tr>
<td>Kunene</td>
<td>31,658</td>
<td>32,359</td>
<td></td>
</tr>
<tr>
<td>Hardap</td>
<td>32,767</td>
<td>33,728</td>
<td></td>
</tr>
<tr>
<td>Omaheke</td>
<td>25,423</td>
<td>27,312</td>
<td></td>
</tr>
<tr>
<td>Erongo</td>
<td>26,531</td>
<td>28,939</td>
<td></td>
</tr>
<tr>
<td>Khomas</td>
<td>79,365</td>
<td>87,706</td>
<td></td>
</tr>
<tr>
<td>Otjozondjupa</td>
<td>47,315</td>
<td>55,221</td>
<td></td>
</tr>
<tr>
<td>Karas</td>
<td>27,239</td>
<td>33,923</td>
<td></td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>723,593</strong></td>
<td><strong>686,327</strong></td>
<td></td>
</tr>
</tbody>
</table>


#### B. Population in Namibia by region 1991

<table>
<thead>
<tr>
<th>Region</th>
<th>Number</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Women</td>
<td>Men</td>
<td></td>
</tr>
<tr>
<td>Omusati</td>
<td>106,300</td>
<td>83,600</td>
<td></td>
</tr>
<tr>
<td>Ohangwena</td>
<td>99,500</td>
<td>80,200</td>
<td></td>
</tr>
<tr>
<td>Oshana</td>
<td>73,300</td>
<td>61,500</td>
<td></td>
</tr>
<tr>
<td>Okavango</td>
<td>61,100</td>
<td>55,800</td>
<td></td>
</tr>
<tr>
<td>Oshikoto</td>
<td>66,800</td>
<td>62,000</td>
<td></td>
</tr>
<tr>
<td>Caprivi</td>
<td>46,400</td>
<td>44,100</td>
<td></td>
</tr>
<tr>
<td>Kunene</td>
<td>31,700</td>
<td>32,400</td>
<td></td>
</tr>
<tr>
<td>Hardap</td>
<td>32,800</td>
<td>33,700</td>
<td></td>
</tr>
<tr>
<td>Omaheke</td>
<td>25,400</td>
<td>27,300</td>
<td></td>
</tr>
<tr>
<td>Erongo</td>
<td>26,500</td>
<td>28,900</td>
<td></td>
</tr>
<tr>
<td>Khomas</td>
<td>79,400</td>
<td>87,700</td>
<td></td>
</tr>
<tr>
<td>Otjozondjupa</td>
<td>47,300</td>
<td>55,200</td>
<td></td>
</tr>
<tr>
<td>Karas</td>
<td>27,200</td>
<td>33,900</td>
<td></td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>724,600</strong></td>
<td><strong>686,300</strong></td>
<td></td>
</tr>
</tbody>
</table>


#### C. Population in Namibia by region 1991

<table>
<thead>
<tr>
<th>Region</th>
<th>Numbers in 1,000's</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Women</td>
<td>Men</td>
<td></td>
</tr>
<tr>
<td>Omusati</td>
<td>106</td>
<td>84</td>
<td></td>
</tr>
<tr>
<td>Ohangwena</td>
<td>99</td>
<td>80</td>
<td></td>
</tr>
<tr>
<td>Oshana</td>
<td>73</td>
<td>62</td>
<td></td>
</tr>
<tr>
<td>Okavango</td>
<td>61</td>
<td>56</td>
<td></td>
</tr>
<tr>
<td>Oshikoto</td>
<td>67</td>
<td>62</td>
<td></td>
</tr>
<tr>
<td>Caprivi</td>
<td>46</td>
<td>44</td>
<td></td>
</tr>
<tr>
<td>Kunene</td>
<td>32</td>
<td>32</td>
<td></td>
</tr>
<tr>
<td>Hardap</td>
<td>33</td>
<td>34</td>
<td></td>
</tr>
<tr>
<td>Omaheke</td>
<td>25</td>
<td>27</td>
<td></td>
</tr>
<tr>
<td>Erongo</td>
<td>27</td>
<td>29</td>
<td></td>
</tr>
<tr>
<td>Khomas</td>
<td>79</td>
<td>88</td>
<td></td>
</tr>
<tr>
<td>Otjozondjupa</td>
<td>47</td>
<td>55</td>
<td></td>
</tr>
<tr>
<td>Karas</td>
<td>27</td>
<td>34</td>
<td></td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>724</strong></td>
<td><strong>686</strong></td>
<td></td>
</tr>
</tbody>
</table>


The purpose is not to give an overview of presentation basics in statistics. Such information can be found in basic statistical textbooks. For more detailed guidelines to graphical presentation we refer to *Graphing Statistics and Data: Creating Better Charts*. Anders Wallgren...[et al.]. Sage Publications. 1996.
### A Dropout rate at different stages of school education in India 1960–1994

<table>
<thead>
<tr>
<th>Year</th>
<th>Primary (I–V classes)</th>
<th>Elementary (I–VIII classes)</th>
<th>Secondary (I–X classes)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Girls</td>
<td>Boys</td>
<td>Girls</td>
</tr>
<tr>
<td>1960–61</td>
<td>70.93</td>
<td>61.74</td>
<td>.</td>
</tr>
<tr>
<td>1965–66</td>
<td>70.49</td>
<td>63.17</td>
<td>.</td>
</tr>
<tr>
<td>1970–71</td>
<td>70.92</td>
<td>64.48</td>
<td>83.40</td>
</tr>
<tr>
<td>1975–76</td>
<td>66.18</td>
<td>60.21</td>
<td>82.80</td>
</tr>
<tr>
<td>1980–81</td>
<td>62.50</td>
<td>56.20</td>
<td>79.40</td>
</tr>
<tr>
<td>1981–82</td>
<td>57.30</td>
<td>51.10</td>
<td>77.70</td>
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<tr>
<td>1982–83</td>
<td>56.30</td>
<td>49.40</td>
<td>74.96</td>
</tr>
<tr>
<td>1983–84</td>
<td>53.96</td>
<td>47.83</td>
<td>75.27</td>
</tr>
<tr>
<td>1988–89</td>
<td>49.69</td>
<td>46.74</td>
<td>68.31</td>
</tr>
<tr>
<td>1989–90</td>
<td>50.35</td>
<td>46.50</td>
<td>68.75</td>
</tr>
<tr>
<td>1990–91</td>
<td>45.97</td>
<td>40.10</td>
<td>65.13</td>
</tr>
<tr>
<td>1991–92</td>
<td>45.17</td>
<td>41.03</td>
<td>62.04</td>
</tr>
<tr>
<td>1992–93</td>
<td>43.02</td>
<td>40.07</td>
<td>60.06</td>
</tr>
<tr>
<td>1993–94</td>
<td>39.05</td>
<td>36.07</td>
<td>56.78</td>
</tr>
</tbody>
</table>

Note: Total dropout rate during a course (stage) has been taken as a per cent of enrollment in the first year of the course (stage), Primary, Elementary and Secondary stages consist of classes I–V, I–VIII and I–X.

• Not available

1 Provisional


The same comments as in recommendation 1 hold for percentages. Percentages with one or more decimals are difficult to compare. In addition, they often give a false impression of exactness. Table C (see next page) gives the reader the best options for analysis.

### B Dropout rate at different stages of school education in India 1960–1994

<table>
<thead>
<tr>
<th>Year</th>
<th>Primary (I–V classes)</th>
<th>Elementary (I–VIII classes)</th>
<th>Secondary (I–X classes)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Girls</td>
<td>Boys</td>
<td>Girls</td>
</tr>
<tr>
<td>1960–61</td>
<td>70.9</td>
<td>61.7</td>
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<tr>
<td>1965–66</td>
<td>70.5</td>
<td>63.2</td>
<td>.</td>
</tr>
<tr>
<td>1970–71</td>
<td>70.9</td>
<td>64.5</td>
<td>83.4</td>
</tr>
<tr>
<td>1975–76</td>
<td>66.2</td>
<td>60.2</td>
<td>82.8</td>
</tr>
<tr>
<td>1980–81</td>
<td>62.5</td>
<td>56.2</td>
<td>79.4</td>
</tr>
<tr>
<td>1981–82</td>
<td>57.3</td>
<td>51.1</td>
<td>77.7</td>
</tr>
<tr>
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<td>56.3</td>
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</tr>
<tr>
<td>1983–84</td>
<td>54.0</td>
<td>47.8</td>
<td>75.3</td>
</tr>
<tr>
<td>1988–89</td>
<td>49.7</td>
<td>46.7</td>
<td>68.3</td>
</tr>
<tr>
<td>1989–90</td>
<td>50.4</td>
<td>46.5</td>
<td>68.8</td>
</tr>
<tr>
<td>1990–91</td>
<td>46.0</td>
<td>40.1</td>
<td>65.1</td>
</tr>
<tr>
<td>1991–92</td>
<td>45.2</td>
<td>41.0</td>
<td>62.0</td>
</tr>
<tr>
<td>1992–93</td>
<td>43.0</td>
<td>40.1</td>
<td>60.1</td>
</tr>
<tr>
<td>1993–94</td>
<td>39.1</td>
<td>36.1</td>
<td>56.8</td>
</tr>
</tbody>
</table>

Note: Total dropout rate during a course (stage) has been taken as a per cent of enrollment in the first year of the course (stage), Primary, Elementary and Secondary stages consist of classes I–V, I–VIII and I–X.

• Not available

1 Provisional

### C Dropout rate at different stages of school education in India 1960–1994

<table>
<thead>
<tr>
<th>Year</th>
<th>Primary (I–V classes)</th>
<th></th>
<th>Elementary (I–VIII classes)</th>
<th></th>
<th>Secondary (I–X classes)</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Girls</td>
<td>Boys</td>
<td>Girls</td>
<td>Boys</td>
<td>Girls</td>
<td>Boys</td>
</tr>
<tr>
<td>1960–61</td>
<td>71</td>
<td>62</td>
<td>.</td>
<td>.</td>
<td>.</td>
<td>.</td>
</tr>
<tr>
<td>1965–66</td>
<td>70</td>
<td>63</td>
<td>.</td>
<td>.</td>
<td>.</td>
<td>.</td>
</tr>
<tr>
<td>1970–71</td>
<td>71</td>
<td>64</td>
<td>83</td>
<td>75</td>
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<td>.</td>
</tr>
<tr>
<td>1975–76</td>
<td>66</td>
<td>60</td>
<td>83</td>
<td>74</td>
<td>.</td>
<td>.</td>
</tr>
<tr>
<td>1980–81</td>
<td>63</td>
<td>56</td>
<td>79</td>
<td>68</td>
<td>87</td>
<td>80</td>
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<tr>
<td>1981–82</td>
<td>57</td>
<td>51</td>
<td>78</td>
<td>69</td>
<td>87</td>
<td>79</td>
</tr>
<tr>
<td>1982–83</td>
<td>56</td>
<td>49</td>
<td>75</td>
<td>66</td>
<td>86</td>
<td>78</td>
</tr>
<tr>
<td>1983–84</td>
<td>54</td>
<td>48</td>
<td>75</td>
<td>66</td>
<td>85</td>
<td>76</td>
</tr>
<tr>
<td>1988–89</td>
<td>50</td>
<td>47</td>
<td>68</td>
<td>59</td>
<td>79</td>
<td>73</td>
</tr>
<tr>
<td>1989–90</td>
<td>50</td>
<td>47</td>
<td>69</td>
<td>61</td>
<td>78</td>
<td>71</td>
</tr>
<tr>
<td>1990–91</td>
<td>46</td>
<td>40</td>
<td>65</td>
<td>59</td>
<td>77</td>
<td>68</td>
</tr>
<tr>
<td>1991–92†</td>
<td>45</td>
<td>41</td>
<td>62</td>
<td>54</td>
<td>76</td>
<td>69</td>
</tr>
<tr>
<td>1992–93†</td>
<td>43</td>
<td>40</td>
<td>60</td>
<td>54</td>
<td>75</td>
<td>68</td>
</tr>
<tr>
<td>1993–94†</td>
<td>39</td>
<td>36</td>
<td>57</td>
<td>50</td>
<td>75</td>
<td>68</td>
</tr>
</tbody>
</table>

Note: Total dropout rate during a course (stage) has been taken as a per cent of enrollment in the first year of the course (stage). Primary, Elementary and Secondary stages consist of classes I–V, I–VIII and I–X.

- Not available

† Provisional

Gender analysis focuses on similarities and differences between women and men in various subgroups and over time. For that reason the gender-blind total is useless. Hence, Table B is preferred to Table A.

**A Average income from work for employees ages 20–64 in Sweden, 1980–1994**

<table>
<thead>
<tr>
<th>Year</th>
<th>Women (SEK)</th>
<th>Men (SEK)</th>
<th>Total (SEK)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1980</td>
<td>53,000</td>
<td>79,400</td>
<td>67,200</td>
</tr>
<tr>
<td>1985</td>
<td>77,300</td>
<td>117,300</td>
<td>97,000</td>
</tr>
<tr>
<td>1989</td>
<td>111,300</td>
<td>166,800</td>
<td>139,100</td>
</tr>
<tr>
<td>1993</td>
<td>138,500</td>
<td>198,600</td>
<td>167,500</td>
</tr>
<tr>
<td>1994</td>
<td>144,700</td>
<td>208,800</td>
<td>176,200</td>
</tr>
</tbody>
</table>


**B Average income from work for employees ages 20–64 in Sweden, 1980–1994**

<table>
<thead>
<tr>
<th>Year</th>
<th>Women (SEK)</th>
<th>Men (SEK)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1980</td>
<td>53,000</td>
<td>79,400</td>
</tr>
<tr>
<td>1985</td>
<td>77,300</td>
<td>117,300</td>
</tr>
<tr>
<td>1989</td>
<td>111,300</td>
<td>166,800</td>
</tr>
<tr>
<td>1993</td>
<td>138,500</td>
<td>198,600</td>
</tr>
<tr>
<td>1994</td>
<td>144,700</td>
<td>208,800</td>
</tr>
</tbody>
</table>


Moreover, inclusion of the total in graphs makes comparisons between women and men very difficult. See Graph C. If the total is deleted, as in Graph D, the picture becomes more distinct.
Recommendation 4
Use graphs that give clear, visual information.

A  Average income from work for employees ages 20–64 in Sweden, 1980–1994

<table>
<thead>
<tr>
<th>Year</th>
<th>Women (SEK)</th>
<th>Men (SEK)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1980</td>
<td>53,000</td>
<td>79,400</td>
</tr>
<tr>
<td>1985</td>
<td>77,300</td>
<td>117,300</td>
</tr>
<tr>
<td>1989</td>
<td>111,300</td>
<td>166,800</td>
</tr>
<tr>
<td>1993</td>
<td>138,500</td>
<td>198,600</td>
</tr>
<tr>
<td>1994</td>
<td>144,700</td>
<td>208,800</td>
</tr>
</tbody>
</table>


B  Average income from work for employees ages 20–64 Sweden, 1980–1994

Graphs should be used to give a clear picture of the data. They should give readers a quicker and more easily understood information than can be gleaned from a table. See Table A and Graph B. Note the equal distance between years on the x-axis.

Nowadays, PC programs offer an abundance of graphical illustrations. Unfortunately, a number of them can distort the true picture and lead to misinterpretation of data.

For example, graphs with a third, unnecessary dimension make comparisons between bars very difficult. It is hard to identify the height of the bars. See Graph C.

Figures on top of bars also add distortion, making the bars look higher than they are. See Graph D. If numbers are regarded important, a table should be presented instead of or in addition to the graph, as in Table A and Graph B.

C  Average income from work for employees ages 20–64 in Sweden, 1980–1994

Graphs with a third, unnecessary dimension are misleading...

D  Average income from work for employees ages 20–64 in Sweden, 1980–1994

... and so are graphs with numbers on top of bars.
### A Literacy rate by age in Vietnam 1989

<table>
<thead>
<tr>
<th>Age group</th>
<th>Women</th>
<th>Men</th>
</tr>
</thead>
<tbody>
<tr>
<td>10–14</td>
<td>92</td>
<td>93</td>
</tr>
<tr>
<td>15–19</td>
<td>92</td>
<td>93</td>
</tr>
<tr>
<td>20–24</td>
<td>93</td>
<td>94</td>
</tr>
<tr>
<td>25–29</td>
<td>93</td>
<td>95</td>
</tr>
<tr>
<td>30–34</td>
<td>92</td>
<td>96</td>
</tr>
<tr>
<td>35–39</td>
<td>90</td>
<td>95</td>
</tr>
<tr>
<td>40–44</td>
<td>87</td>
<td>95</td>
</tr>
<tr>
<td>45–49</td>
<td>82</td>
<td>94</td>
</tr>
<tr>
<td>50–54</td>
<td>75</td>
<td>93</td>
</tr>
<tr>
<td>55–59</td>
<td>67</td>
<td>90</td>
</tr>
<tr>
<td>60 and above</td>
<td>38</td>
<td>78</td>
</tr>
<tr>
<td>Total</td>
<td>84</td>
<td>92</td>
</tr>
</tbody>
</table>


Graphs should include the zero on the y-axis for a quantitative variable. See graph B. Comparisons of differences and similarities between women and men are otherwise distorted. Differences between women and men appear larger than they are if the zero is excluded. See Graph C. For example, literacy rates for especially women in higher ages seem to be much lower than they are in reality.

### B Literacy rate by age in Vietnam 1989

![Graph B](image)

**Note**


### C Literacy rate by age in Vietnam 1989

![Graph C](image)

**Note**


**Recommendation 5**

Start from zero at the y-axis for a quantitative variable.
A Occupations with concentrations of 78 per cent of those employed in Chile 1992, ranked in alphabetic order

Numbers in 1,000’s and sex distribution (%)

<table>
<thead>
<tr>
<th>Occupation</th>
<th>Number</th>
<th>Sex distribution</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agriculture workers, gardeners and related</td>
<td>57</td>
<td>Women 15</td>
</tr>
<tr>
<td>Architects, engineers and related</td>
<td>6</td>
<td>Men 85</td>
</tr>
<tr>
<td>Bookkeepers, tellers, collectors</td>
<td>34</td>
<td>Women 68</td>
</tr>
<tr>
<td>Butchers, bakers, millers</td>
<td>18</td>
<td>Men 25</td>
</tr>
<tr>
<td>Carpenters, turners and related</td>
<td>1</td>
<td>Women 1</td>
</tr>
<tr>
<td>Chauffeurs and other drivers</td>
<td>2</td>
<td>Men 1</td>
</tr>
<tr>
<td>Commerce, services, garage workers</td>
<td>14</td>
<td>Women 18</td>
</tr>
<tr>
<td>Construction workers</td>
<td>1</td>
<td>Men 1</td>
</tr>
<tr>
<td>Cooks and household workers</td>
<td>303</td>
<td>Women 99</td>
</tr>
<tr>
<td>Cooks, waitresses/ers</td>
<td>49</td>
<td>Men 43</td>
</tr>
<tr>
<td>Doormen, caretakers, lift attendants</td>
<td>19</td>
<td>Women 30</td>
</tr>
<tr>
<td>Electricians and related</td>
<td>1</td>
<td>Women 2</td>
</tr>
<tr>
<td>Masons, building workers, others</td>
<td>0</td>
<td>Women 0</td>
</tr>
<tr>
<td>Mechanics</td>
<td>1</td>
<td>Women 1</td>
</tr>
<tr>
<td>Nurses and midwives</td>
<td>54</td>
<td>Men 15</td>
</tr>
<tr>
<td>Office clerks, secretaries, bank clerks and related</td>
<td>258</td>
<td>Women 50</td>
</tr>
<tr>
<td>Plumbers, fitters</td>
<td>1</td>
<td>Men 2</td>
</tr>
<tr>
<td>Primary school teachers</td>
<td>76</td>
<td>Women 78</td>
</tr>
<tr>
<td>Security service workers</td>
<td>1</td>
<td>Women 2</td>
</tr>
<tr>
<td>Shop assistants and saleswomen/men</td>
<td>102</td>
<td>Women 56</td>
</tr>
<tr>
<td>Tailors, dressmakers, furrers and related</td>
<td>40</td>
<td>Women 81</td>
</tr>
<tr>
<td>Transport workers</td>
<td>11</td>
<td>Women 18</td>
</tr>
<tr>
<td>Total</td>
<td>1,050</td>
<td>Women 38</td>
</tr>
<tr>
<td></td>
<td>1,685</td>
<td>Men 62</td>
</tr>
</tbody>
</table>


B Occupations with concentrations of 78 per cent of those employed in Chile 1992, ranked in alphabetic order

Number and sex distribution (%)

C Occupations with concentrations of 78 per cent of those employed in Chile 1992, ranked by proportion of women

Number and sex distribution (%)

<table>
<thead>
<tr>
<th>Women 1,050,100</th>
<th>Men 1,684,900</th>
</tr>
</thead>
<tbody>
<tr>
<td>% 100 80 60 40 20 0 20 40 60 80 100 %</td>
<td></td>
</tr>
<tr>
<td>Cooks and household workers</td>
<td>Cooks, waitresses/ers</td>
</tr>
<tr>
<td>Nurses and midwives</td>
<td>Shop assistants and saleswomen/men</td>
</tr>
<tr>
<td>Tailors, dressmakers, furrers and related</td>
<td>Bookkeepers, tellers, collectors</td>
</tr>
<tr>
<td>Primary school teachers</td>
<td>Architects, engineers and related</td>
</tr>
<tr>
<td>Bookkeepers, tellers, collectors</td>
<td>Plumbers, fitters</td>
</tr>
<tr>
<td>Cooks, waitresses/ers</td>
<td>Security service workers</td>
</tr>
<tr>
<td>Shop assistants and saleswomen/men</td>
<td>Electricians and related</td>
</tr>
<tr>
<td>Office clerks, secretaries, bank clerks and related</td>
<td>Chauffeurs and other drivers</td>
</tr>
<tr>
<td>Agriculture workers, gardeners and related</td>
<td>Construction workers</td>
</tr>
<tr>
<td>Masons, building workers, others</td>
<td>Mechanics</td>
</tr>
</tbody>
</table>


By ranking the occupations after the proportion of women, women's and men's labour markets appear more clearly.

D Occupations with concentrations of 78 per cent of those employed in Chile 1992, ranked by proportion of women

Number and sex distribution (%)

<table>
<thead>
<tr>
<th>Women 1,050,100</th>
<th>Men 1,684,900</th>
</tr>
</thead>
<tbody>
<tr>
<td>% 100 80 60 40 20 0 20 40 60 80 100 %</td>
<td></td>
</tr>
<tr>
<td>Cooks and household workers</td>
<td>Cooks, waitresses/ers</td>
</tr>
<tr>
<td>Nurses and midwives</td>
<td>Shop assistants and saleswomen/men</td>
</tr>
<tr>
<td>Bookkeepers, tellers, collectors</td>
<td>Architects, engineers and related</td>
</tr>
<tr>
<td>Cooks, waitresses/ers</td>
<td>Plumbers, fitters</td>
</tr>
<tr>
<td>Shop assistants and saleswomen/men</td>
<td>Security service workers</td>
</tr>
<tr>
<td>Office clerks, secretaries, bank clerks and related</td>
<td>Electricians and related</td>
</tr>
<tr>
<td>Agriculture workers, gardeners and related</td>
<td>Chauffeurs and other drivers</td>
</tr>
<tr>
<td>Masons, building workers, others</td>
<td>Construction workers</td>
</tr>
<tr>
<td>Mechanics</td>
<td></td>
</tr>
</tbody>
</table>


Both absolute numbers and sex distribution within categories, e.g. occupations, can be illustrated in the same graph.

The area given each occupation reflects the total number of women and men in each occupation, compared to the other occupations. See also Graph F.
E Occupations with concentrations of 78 per cent of those employed in Chile 1992, ranked by size in occupation

Number and sex distribution (%)


F Occupations with concentrations of 78 per cent of those employed in Chile 1992, ranked by size in occupation

Number and sex distribution (%)

Pie charts can sometimes be used to illustrate percentage distributions of qualitative variables for a specific group.

However, pie charts should be avoided when differences and similarities of percentage distributions for several groups, e.g. for women and men, should be illustrated.

### A Employed population ages 15 and over by employment status in Namibia 1991

#### Percentage distribution

<table>
<thead>
<tr>
<th>Employment status</th>
<th>Women</th>
<th>Men</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employer</td>
<td>1</td>
<td>3</td>
</tr>
<tr>
<td>Own account worker</td>
<td>24</td>
<td>17</td>
</tr>
<tr>
<td>Employee, government</td>
<td>15</td>
<td>22</td>
</tr>
<tr>
<td>Employee, private</td>
<td>26</td>
<td>47</td>
</tr>
<tr>
<td>Unpaid family worker</td>
<td>34</td>
<td>11</td>
</tr>
<tr>
<td><strong>Total, per cent</strong></td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td><strong>number</strong></td>
<td>170,900</td>
<td>217,100</td>
</tr>
</tbody>
</table>


### B Employed population ages 15 and over by employment status in Namibia 1991

#### Percentage distribution

In Graph B it is very difficult to compare the percentage of all women and the percentage of all men in various categories (employment status). For such comparisons a bar chart, as in Graph C, is more suitable. Note that the categories (employment status) are ranked according to the percentage of all women in the category.

### C Employed population ages 15 and over by employment status in Namibia 1991

#### Percentage distribution


**Recommendation 7**

Avoid pie charts when distributions for several groups should be compared.
Sometimes, comparisons of both measures of central tendency in the form of median and of dispersion in the form of interquartile range and other percentiles are of interest for subgroups of women and men. In these cases boxplots are recommended.

### A Salary distribution by qualification level for private sector employees in Sweden 1991

<table>
<thead>
<tr>
<th>Qualification level Distribution</th>
<th>Women</th>
<th>Men</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Management personnel</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>$P_{10}$</td>
<td>17,960</td>
<td>21,610</td>
</tr>
<tr>
<td>$P_{25}$</td>
<td>20,000</td>
<td>25,770</td>
</tr>
<tr>
<td>$P_{50}$</td>
<td>23,680</td>
<td>29,910</td>
</tr>
<tr>
<td>$P_{75}$</td>
<td>29,000</td>
<td>34,970</td>
</tr>
<tr>
<td>$P_{90}$</td>
<td>33,740</td>
<td>40,790</td>
</tr>
<tr>
<td><strong>Personnel in responsible positions with qualified work</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>$P_{10}$</td>
<td>13,080</td>
<td>14,030</td>
</tr>
<tr>
<td>$P_{25}$</td>
<td>14,300</td>
<td>15,320</td>
</tr>
<tr>
<td>$P_{50}$</td>
<td>15,830</td>
<td>17,770</td>
</tr>
<tr>
<td>$P_{75}$</td>
<td>18,260</td>
<td>21,160</td>
</tr>
<tr>
<td>$P_{90}$</td>
<td>21,520</td>
<td>25,000</td>
</tr>
<tr>
<td><strong>Personnel with qualified work</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>$P_{10}$</td>
<td>10,960</td>
<td>11,350</td>
</tr>
<tr>
<td>$P_{25}$</td>
<td>11,800</td>
<td>12,400</td>
</tr>
<tr>
<td>$P_{50}$</td>
<td>12,780</td>
<td>13,700</td>
</tr>
<tr>
<td>$P_{75}$</td>
<td>13,990</td>
<td>15,190</td>
</tr>
<tr>
<td>$P_{90}$</td>
<td>15,220</td>
<td>17,270</td>
</tr>
<tr>
<td><strong>Personnel with routine work</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>$P_{10}$</td>
<td>9,500</td>
<td>9,700</td>
</tr>
<tr>
<td>$P_{25}$</td>
<td>10,300</td>
<td>10,500</td>
</tr>
<tr>
<td>$P_{50}$</td>
<td>11,150</td>
<td>11,420</td>
</tr>
<tr>
<td>$P_{75}$</td>
<td>12,000</td>
<td>12,420</td>
</tr>
<tr>
<td>$P_{90}$</td>
<td>12,980</td>
<td>13,580</td>
</tr>
</tbody>
</table>


The detailed information on salary distribution for various qualificational groups of employees in Table A is clearly illustrated in boxplots in Graph B.

### B Salary distribution by qualification level for private sector employees in Sweden 1991

- **Management personnel**
- **Personnel in responsible positions with qualified work**
- **Personnel with qualified work**
- **Personnel with routine work**
Regional comparisons often include statistical information from many countries or subregions within a country. Comparisons between women and men within and between countries (or subregions within a country) are facilitated by use of suitable graphs. Two examples are given below.

Example 1. Economic activity rates
What are barometer charts give a clear view of women’s and men’s economic activity rates in countries. See Graph B for countries in the ECE region.
However, differences between women’s and men’s economic activity rates within countries are difficult to recognize in B. For this purpose, Graph C is suitable. Note that the countries are ranked by size of difference.

B Economic activity rate for persons with children in ages 0–5(6) by country around 1993

Proportion (%) of all women/men with children in ages 0–5(6)

Austria 69 98
Canada 63 84
Finland 73 95
France 64 92
Germany 48 94
Hungary 47 96
Iceland 74 94
Netherlands 36 95
Norway 69 95
Spain 45 93
Sweden 81 93
Switzerland 37 94
United Kingdom 53 95
United States 58 96


A Economic activity rate for persons with children in ages 0–5(6) by country around 1993

Proportion (%) of all women/men with children in ages 0–5(6)

Country | Women | Men
---|---|---
Austria | 69 | 98
Canada | 63 | 84
Finland | 73 | 95
France | 64 | 92
Germany | 48 | 94
Hungary | 47 | 96
Iceland | 74 | 94
Netherlands | 36 | 95
Norway | 69 | 95
Spain | 45 | 93
Sweden | 81 | 93
Switzerland | 37 | 94
United Kingdom | 53 | 95
United States | 58 | 96


C Economic activity rate for persons with children in ages 0–5(6) by country around 1993

Difference between men’s and women’s economic activity rates

Sweden | Iceland | Finland | Austria | Norway | France | Canada | United States | United Kingdom | Germany | Hungary | Spain | Switzerland | Netherlands
---|---|---|---|---|---|---|---|---|---|---|---|---|---
Rates are higher for Women Men

Example 2. Life expectancy at birth

### A Life expectancy at birth around 1990

<table>
<thead>
<tr>
<th>Country</th>
<th>Women</th>
<th>Men</th>
</tr>
</thead>
<tbody>
<tr>
<td>Botswana</td>
<td>66</td>
<td>65</td>
</tr>
<tr>
<td>Ethiopia</td>
<td>53</td>
<td>51</td>
</tr>
<tr>
<td>Kenya</td>
<td>63</td>
<td>59</td>
</tr>
<tr>
<td>Lesotho</td>
<td>57</td>
<td>54</td>
</tr>
<tr>
<td>Malawi</td>
<td>49</td>
<td>47</td>
</tr>
<tr>
<td>Mozambique</td>
<td>45</td>
<td>42</td>
</tr>
<tr>
<td>Namibia</td>
<td>63</td>
<td>59</td>
</tr>
<tr>
<td>Swaziland</td>
<td>60</td>
<td>53</td>
</tr>
<tr>
<td>Tanzania</td>
<td>51</td>
<td>49</td>
</tr>
<tr>
<td>Uganda</td>
<td>58</td>
<td>47</td>
</tr>
<tr>
<td>Zambia</td>
<td>56</td>
<td>52</td>
</tr>
<tr>
<td>Zimbabwe</td>
<td>62</td>
<td>58</td>
</tr>
</tbody>
</table>


Bar charts can be used to illustrate women’s and men’s life expectancies at birth in different countries or subregions within a country. In Graph B countries are ranked by women’s life expectancy at birth instead of being presented in alphabetic order, as in Table A, to further facilitate comparisons between countries.

### B Life expectancy at birth around 1990

![Graph B](image)


When the numerical value of the variable studied always or nearly always is higher for one sex than for the other, a graph of the type presented in C is very illustrative. Even in this graph countries are ranked by women’s average life expectancy at birth. Note that the x-axis starts at zero, but is broken to facilitate comparisons between women and men, since all values are concentrated between 40 and 70. When an axis is broken in this way, this should be indicated both at the bottom and the top of the graph and at grids within the graph, if grids are used. On the other hand, a similar break of the x-axis is not recommended for Graph B.

### C Life expectancy at birth around 1990

![Graph C](image)

The life cycle approach

In the analysis of gender differentials, an interesting approach is to examine events in women’s and men’s lives over their life cycles. Gender roles emerge early in childhood, when parents assign different tasks to girls and boys and provide them with different care and opportunities, educational curricula, etc. Different images of women and men also contribute to reaffirm gender stereotypes. When girls and boys grow older and girls are exposed to pregnancy, differences become even more evident. After marriage gender roles are completely shaped, and even in modern societies women and men seldom share paid and unpaid work and responsibilities equally. At older ages, women live longer than men and are treated differently by family and society.

A presentation of data that takes into account the different stages in the life of individuals helps illuminate the underlying causes of gender differences and provides a useful tool for gender analysis. For example, time use statistics can be presented for different age groups, for women and men married with/without children, for different household compositions, etc. Economic participation rates can be presented at different ages, for women and men with or without children, for women and men with children in a certain age group, etc.

Two examples are presented below.

**Marital status by age in Zambia 1980**

<table>
<thead>
<tr>
<th>Marital status</th>
<th>Age</th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>15–19</td>
<td>20–24</td>
<td>25–29</td>
<td></td>
</tr>
<tr>
<td>W M W M M M</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Never married</td>
<td>68 98</td>
<td>20 69</td>
<td>8 27</td>
<td></td>
</tr>
<tr>
<td>Married</td>
<td>29 2 73 30</td>
<td>83 70</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Divorced/separated</td>
<td>2 0 6 1</td>
<td>8 3</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Widowed</td>
<td>0 0 1 0</td>
<td>1 0</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total, per cent</td>
<td>100 100</td>
<td>100 100</td>
<td>100 100</td>
<td></td>
</tr>
<tr>
<td>numbers in 1,000’s</td>
<td>308 284</td>
<td>259 213</td>
<td>178 158</td>
<td></td>
</tr>
</tbody>
</table>

**Marital status by age in Zambia 1980**

<table>
<thead>
<tr>
<th>Marital status</th>
<th>Age</th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>30–34</td>
<td>35–39</td>
<td>40–44</td>
<td></td>
</tr>
<tr>
<td>W M W M M M</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Never married</td>
<td>4 10 3 6</td>
<td>3 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Married</td>
<td>85 86 85 90</td>
<td>82 91</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Divorced/separated</td>
<td>9 3 9 3</td>
<td>9 4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Widowed</td>
<td>2 0 3 0</td>
<td>6 1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total, per cent</td>
<td>100 100</td>
<td>100 100</td>
<td>100 100</td>
<td></td>
</tr>
<tr>
<td>numbers in 1,000’s</td>
<td>159 133</td>
<td>130 107</td>
<td>112 100</td>
<td></td>
</tr>
</tbody>
</table>

**Marital status by age in Zambia 1980**

<table>
<thead>
<tr>
<th>Marital status</th>
<th>Age</th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>45–49</td>
<td>50–54</td>
<td>55–</td>
<td></td>
</tr>
<tr>
<td>W M W M M M</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Never married</td>
<td>3 4 4 3</td>
<td>6 3</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Married</td>
<td>77 92 70 92</td>
<td>47 88</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Divorced/separated</td>
<td>11 4 12 4</td>
<td>15 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Widowed</td>
<td>9 1 15 1</td>
<td>32 3</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total, per cent</td>
<td>100 100</td>
<td>100 100</td>
<td>100 100</td>
<td></td>
</tr>
<tr>
<td>numbers in 1,000’s</td>
<td>85 92 70 75</td>
<td>161 184</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Nearly two-thirds of all unpaid work in Sweden is performed by women. Unpaid work requires 33 hours and 15 minutes per week for women and 20 hours and 10 minutes for men. The amount of time devoted to unpaid work varies not only between women and men, but among the different stages of the life cycle.

Women with children 0–6 years spend the greatest number of hours performing unpaid work.

**Summary of recommendations for user friendly presentations**

In the presentation of gender statistics, some simple rules apply:

- Women and men should be presented side by side to facilitate comparisons.
- Women should always be presented before men.
- The words women/men and girls/boys should be used instead of females and males whenever possible.
- When data are presented to a broader audience, numbers should be rounded to 1,000, 100 or 10 and percentages to integers.
- The gender-blind total should be deleted in tables and graphs to facilitate comparisons between women and men.
- Preference should always be given to a simple layout.
- Graphs that give clear, visual information should be used.

A user friendly analysis and presentation of gender statistics in tables and graphs form the basis of gender statistics products. Such products should meet different purposes and different user needs. In the next chapter we will address dissemination of gender statistics in various forms. The steps in preparation of a statistical publication on gender issues will also be presented.
6. Statistical Publications on Gender Issues

Statisticians, through a continuous dialogue with groups of users, identify the statistical products needed for different purposes, considering the level of statistical knowledge of the target audience still balancing the available financial and human resources.

Statistical products

National statistical offices and other institutions regularly produce a number of different types of statistical publications. Data can be compiled and presented in books, booklets, posters and pamphlets or stored in databases available on-line or on diskettes, tapes and CDs. Each of these products can have different formats and layouts. Basic results from censuses and surveys may also be available on tapes or diskettes for ‘expert’ users who wish to further analyse the results or carry out research on specific topics.

A number of regular publications are part of the production of a statistical office – such as census publications, monthly bulletins, yearbooks of national accounts, trade statistics, and health statistics. They include data published from current surveys (such as the Labour Force Survey) or from other current observations (such as price statistics) or from administrative records (such as causes of death, births, etc.). They usually concern one statistical field and are mainly used by specialists.

Other publications present data compiled from different sources and different statistical fields and concern various policy areas. These publications present not only tables and charts, but also text with analysis of data, discussions on methodologies and definitions of indicators.

Gender statistics books and booklets

Statistical publications concerning gender issues contain data from different statistical fields and from different sources. They cover all policy areas and issues and are directed to a large audience. This type of publication should be user friendly – use easily comprehended language, contain clear tables and charts, have the appropriate format and size, and be attractive in general.

The scope of the publication may vary depending on several elements such as the specific target audience, the budget, the level of development of the whole statistical system and the availability of gender statistics. In general smaller publications containing only basic indicators and limited text are suitable for a large audience, and represent an important first step in the work on gender statistics. A more comprehensive publication, presenting not only statistics and indicators, but more extensive text with analysis of data is more suitable for policy makers and programme officers and planners who can use it as a basis for their work.

Small statistical booklets have been produced in a number of countries around the world, following the example of the booklet Women and Men in Sweden, prepared by Statistics Sweden for the first time in 1985.
Books presenting analyses of gender issues, based on statistics and indicators, are an important tool for policymakers. They require a greater level of resources and are generally prepared after other more simple statistical products have been issued in the country. Examples are represented by The World’s Women: Trends and Statistics, produced by the United Nations for the first time in 1991 and for the second time in 1995, by Kvinno- och Manskården prepared by Statistics Sweden and Analysis of African Women and Men. The Tanzanian Case.  

The first type of publication is usually prepared by the statistical authority, or by other bodies concerned with dissemination of information – such as ministries, research organizations, women’s machinery, NGOs, etc. They are directed to a large audience and can be disseminated through many different channels often free of charge. Ideally, these publications should be very attractive, use illustrations, present simple tables and charts and provide simple explanations of definitions and concepts. Typical users for such products are people who are not familiar with statistics and have little experience interpreting data. Since they generally do not further analyse the data themselves, they have to be provided with statistics and indicators that already address problems clearly and directly, with a few clear messages concerning gender issues and problems. 

Data can refer to different years and different geographical areas. For the first group of publications, we can also include the pamphlets and posters prepared to reach the largest audience possible. The goal is to inform and sensitize public opinion and policy makers to gender issues.  

The second type of publication is in many ways more than a statistical publication. The text is an important part of the book and goes beyond single commentary on the tables and charts. Data are usually compiled from official statistics, but can also be drawn from small scale studies. The language is an essential element for the success of these publications. Attention is also given to the layout, the cover and in some cases to artistic or graphic illustrations. The publication is generally a joint endeavor between statisticians and other experts in various fields. It can be the responsibility of a single body (Government, international agency, etc.) or a collaborative effort of several organizations.  

These publications are directed both to expert and non-expert readers. They can be used as resource information, training material, an advocacy instrument or simply as a statistical source.
Preparation of a publication on gender statistics

In the following we will examine the steps necessary for the preparation of a statistical publication on gender issues. We refer to a book containing data and analysis on all major areas of concern for the population.

The operations involved in the preparation process are the following:

### Preparation of a Gender Statistics Publication

<table>
<thead>
<tr>
<th>Phase 1</th>
<th>Identify key questions to be addressed statistics and indicators available sources of data</th>
</tr>
</thead>
<tbody>
<tr>
<td>Phase 2</td>
<td>Assess financial and human resources and time available Identify experts responsible for each activity Prepare budget</td>
</tr>
<tr>
<td>Phase 3</td>
<td>Decide layout, number of pages and size language number of tables and charts colours, illustrations and cover</td>
</tr>
<tr>
<td>Phase 4</td>
<td>Gather data Prepare tables and charts Draft text</td>
</tr>
<tr>
<td>Phase 5</td>
<td>Improve tables and charts Edit text Decide final version of colours, illustrations, type of printing and cover</td>
</tr>
<tr>
<td>Phase 6</td>
<td>Present the publication to users (users/producers seminar) Discuss with users dissemination methods</td>
</tr>
<tr>
<td>Phase 7</td>
<td>Final revision Final printing Marketing and dissemination</td>
</tr>
</tbody>
</table>
Phase 1 – Identification of topics and related statistics
At this stage, the main objectives, the audience and the type of publication have already been defined. This phase concerns the definition of specific topics to be addressed and the related statistics and indicators necessary to adequately depict them. This operation is crucial and is conducted by producers in close cooperation with users. Meetings and seminars can be organized to bring together the staff responsible for the publication with representatives from different groups of users. Discussions should focus on relevant policy areas, the issues to be addressed and the related statistics.

Producers identify available sources of data, exploring all possible alternatives, including statistics compiled by specialized agencies and government bodies.

Phase 2 – Workplan and available resources
In the second phase, the body responsible for the publication assesses the resources available to produce the book. The work is planned on the basis of the human and financial resources made available for the publication. The size of the book and the level of dissemination as well as the type of printing, colours and cover will also be decided depending on the level of resources available.

The selection of experts to do the analysis and the writing is a crucial step and depends on budget constraints. Ideally, on each relevant policy area one expert in the field should be engaged to do the work. The expert should be able to analyse the data and write clearly and concisely. The project team will then compile the reports prepared by the experts. Alternatively, statisticians with experience in various fields can work together to draft the entire book.

A group of experts and policy makers (advisory group) can also provide guidance throughout the production of the book to guarantee that issues are adequately addressed, and that data presentation and analyses are clear and suitable to the target group of users.

In this phase the project team also prepares a detailed budget and work plan based on input from all responsible persons and bodies for each activity.

Phase 3 – Style and format of the publication
The project team, usually together with the advisory group, decides at this stage the style and format of the publication. Depending on the financial resources, different alternatives can be considered: colours or black and white, hard or soft cover, pictures or drawings, etc. Good results can also be obtained with limited resources and simple techniques. A black and white publication, for example, can be as effective as a more expensive publication. Simple black and white drawings can effectively replace expensive colour illustrations.

The size of the publication and the number of pages are also defined at this stage. This is essential to set limits in terms of time and resources, and to assign adequate space to each topic covered. Size and number of pages are two important elements in the dissemination of the publication and vary depending on the target audience. When assigning space to the various topics, the approximate number of tables and charts needs to be delimited.

A very important aspect in gender statistics publications is the language. Analysts and writers should use a simple and clear language, avoiding jargon. The description of trends and comparisons between different groups should be presented in simple words, keeping a consistent pattern throughout the book. Analysts and writers should also provide readers with a clear explanation of the technical terms used, a description of the indicators presented and the related definitions.

To obtain clarity and simplicity, the structure of the chapters should be decided in advance and should be consistent across all chapters. Preferably each chapter should contain a brief summary.
of the main messages, followed by deeper analyses presented in various sections and subsections.

The layout is a very important element for the success of the publication. A well studied layout helps the reader follow the presentation. For example, a two or three column format, with boxes containing detailed analysis or data on special issues, might prove more attractive with greater readability than other formats. Similarly, different fonts (typographic types), bold face or bigger and smaller types can be used to highlight messages and to make the publication more attractive to readers.

Phase 4 – Compilation of data and drafting of text
Once basic statistics and indicators are compiled from various sources, the text is drafted. The gathering of additional data might also continue throughout the preparation of the book as new data and studies become available. The whole operation will be conducted by the various experts or by the team of statisticians, generally coordinated by one or more persons responsible for the publication.

Phase 5 – Revision of the first draft
During this phase, the content and presentation of the first draft is revised, edited and improved. The text is revised to ensure that the language is clear and that the main messages and the analysis are adequate both in content and presentation to the needs of the readers. Tables and charts are improved until they are clear and understandable. The same format should be used for all tables and charts, using the same colours (or shadows) for the same variables throughout the book.

All the aspects of the publication – colours, layout, illustrations, type of printing, etc. – are further discussed and revised. At the end of this phase, the draft is ready to present to users.

Phase 6 – Users/producers seminar to discuss the draft
Before the publication is finalized, it is preferable that producers together with experts from various fields and representatives from different groups of users revise the draft to ensure that the initial objectives are met and the presentation is clear. This can be done in a one- or two-day meeting. During the meeting, the strategy for dissemination is also discussed, including the price of the publication (when applicable) and the marketing plan.

Phase 7 – Finalizing, marketing and disseminating the publication
The draft is revised according to the results of the users/producers meeting and then printed. A presentation of the book to the public and the media is recommended as a dissemination strategy.
Statistical Publications on Gender Issues
7. Training in Gender Statistics

Success in improving gender statistics at national and international levels requires a close and continuous cooperation between users and producers of statistics. It also requires training both users and producers. Producers of statistics need to be aware of gender issues in society and how to integrate the improvement of gender statistics into the development of the entire official statistical system at the national level. Users of statistics have to know the potentialities and limitations of producing and presenting statistics in general and how to influence improvements of gender statistics.

Purpose and target groups of the chapter

Both users and producers of statistics need to know the various aspects of the production and dissemination of statistics related to gender concerns in society. The previous chapters give guidance in the steps of this process and highlight problems faced by producers of gender statistics. The methodology described in this book may be a tool for statisticians to develop a gender statistics programme, but could also be the basis of a training activity.

Training workshops provide participants with a deeper understanding of gender issues and gender statistics and are effective in bringing together persons working on gender statistics, to share experience and develop new ideas.

The content of and the time assigned to training activities depend on the purpose of the training, the experience of participants, the time and resources available, etc. This chapter presents an example of a programme for a training workshop for users and producers of gender statistics. The chapter is primarily targeted to trainers in gender statistics as a guide to organising training workshops and preparing the related materials.

A training workshop

Objectives and output of the workshop

The training workshop presented in the following covers the entire process of producing and disseminating statistics related to gender issues. It has a duration of five days. The workshop is intended to be part of a broader programme to improve gender statistics at the national level.
The *participants to be trained in the workshop* are assigned or expected to be core members of a national working group on gender statistics consisting of:

- Statisticians from statistical offices (national and/or regional), line ministries and other agencies that are responsible for the production of statistics.
- Gender programme officers of government and non-governmental organisations, advocates of and researchers in gender and development.

The *objectives of the training* are to:

- Familiarise statisticians and users of statistics with various aspects of gender issues, requirements for a gender statistics programme, and ongoing international work in the field of gender statistics;
- Introduce participants to basic concepts of gender analysis and to the conceptual frameworked gender-related problems and their underlying causes and effects;
- Establish a minimum list of statistics and indicators on women and men related to critical national gender issues;
- Acquaint the participants with aspects of availability and quality of data;
- Train participants on the analysis and presentation of gender statistics;
- Set up the framework and develop a preliminary plan for future work with gender statistics in the country.

The *outputs of the workshop* are:

- Draft list of gender issues in the country based on participants’ experiences;
- Draft list of statistics and indicators on gender issues;
- Draft plan for the production and dissemination of a statistical publication on gender issues and for a report on the needs for improved gender statistics in the country.

**Programme and training methodology**

The programme of the workshop includes lectures, group work, presentation of group work and plenary discussions. The output of one session is used as input for another. The workshop ends with a draft plan for further work with gender statistics in the given country.

Participants are required to prepare themselves in advance and encouraged to bring material that can be used at the workshop. Users are asked to look at and prepare material on gender issues from their own country. Statisticians should bring statistics on specific topics and fields.

The suggested duration of the workshop is five days of approximately six to seven hours of work. Experience has shown that time assigned to working group activities is often insufficient. It is recommended to take this in consideration and when needed, allow also a couple of evenings to extend the available time.

In the following, the programme of the workshop is presented followed by instructions for trainers. Suggestions for preparatory work and working group exercises are given as appendices.
Programme

Workshop on Gender Statistics

Day 1

Introductory Session
1h. 30 min. Opening of the workshop
        Presentation of programme/information on workshop
        Introduction of participants and resource persons

I. Gender Issues and Development
1 h. 15 min. Lecture: Gender issues worldwide
1 h. 15 min. Lecture: National gender issues
45 min. Working group exercise 1, part 1: Identification of gender issues
45 min. Presentation of group work and plenary discussion
1 h. Working group exercise 1, part 2: Identification of gender issues
Total time: 6 h. 30 min.

Day 2

1 h. Working group exercise 1, part 2 continued
1 h. Presentation of group work and plenary discussion

II. Statistics and Indicators on Gender Issues
1 h. 30 min. Lecture: Statistics and indicators on gender issues
45 min. Working group exercise 2, part 1: Identification of needed statistics and indicators on gender issues
45 min. Presentation of group work and plenary discussion
15 min. Introduction to working group exercise 2, part 2
1 h. 30 min. Working group exercise 2, part 2: Identification and grouping of needed statistics by statistical fields
Total time: 6 h. 45 min.

Continued
Day 3
30 min. Working group exercise 2, part 2, continued
1 h. Presentation of group work and plenary discussion

III. Availability and Quality of Data
1 h. 15min. Lecture: Availability and quality of data
1 h. 30min. Working group exercise 3: Assessment of availability and quality of data needed
1 h. Presentation of group work and plenary discussion

IV. Analysis and Presentation of Gender Statistics
1 h. 15min. Lecture: Analysis and presentation of gender statistics
Total time: 6 h. 30 min.

Day 4
45 min. Working group exercise 4, part 1: Analysis and presentation of gender statistics
45 min. Presentation of group work and plenary discussion
3 h. Working group exercise 4, part 2: Analysis and presentation of gender statistics
2 h. Presentation of group work and plenary discussion
Total time: 6 h. 30 min.

Day 5
V. Gender Statistics Products
1 h. Lecture: Gender statistics products
1 h. 30 min. Plenary discussion

VI. Plan for Work with Gender Statistics
45 min. Lecture: Development of a plan for work with gender statistics
1 h. 30min. Working group exercise 5: Plan for work with gender statistics
1 h. 30 min. Presentation of group work and plenary discussion

Closing Session
45 min. Evaluation
Closing
Total time: 7 h.
Total workshop time (time for lunch not included): 33 h. 15 min.
Guidelines for workshop trainers

Logistic arrangements
Breaks for coffee/tea are included in the suggested time frames. Time for these breaks and for lunch and dinner should be included in the final programme.

If participants do not live at the venue of the workshop, they should arrive the day before the workshop starts. This day should be included in the programme together with the activities, ‘Arrival and registration of participants’. Alternatively, if participants arrive in the morning of the first day of the workshop, the first activity of the day should be ‘Registration of participants’.

Representatives from both users and producers should be included in all working groups. The same working groups should be kept during the entire workshop.

Preparatory work of participants
Certain preparations are necessary to ensure that all participants benefit from the workshop. Specifically, participants will need to be acquainted with gender issues in their own country and the availability of relevant statistics. For this purpose, users of gender statistics are requested to prepare a brief report on gender issues in their country and on how these are addressed in national policies, plans and programmes. If possible, these reports should be distributed to all participants in advance.

The report on gender issues should cover the following:
1. Existing goals for equal opportunities/advancement of women in the country as specified in the national development plan and other documents where gender issues are discussed/addressed.
2. Main problems and concerns related to gender issues/women’s situation compared to men’s in the country.

Statisticians participating in the workshop are requested to compile available statistics from their fields of expertise to be used during the training.

Detailed instructions on the content of the workshop

Introductory Session

Opening of the workshop
At the opening of the workshop the objectives and expected outputs are presented. The level of commitment expected of the participants during the workshop is also explained.

Presentation of programme/information on the workshop
The training methodology and the time schedule for the various activities is explained. Any administrative matters are also brought up.

Introduction of participants and resource persons
Each participant and resource person gives a brief presentation on their experience of gender related activities and statistical background.

I. Gender Issues and Development

Lecture on gender issues and development
The lecture on gender issues worldwide is based on Chapter 2 of the training material. It starts with an exercise to clarify the difference between sex and gender. Participants are called on to state attributes they associate with the words ‘women’ and ‘men’. These characteristics are listed under the respective works on the black board. The next step is to determine whether the charac-
II. Statistics and Indicators on Gender Issues

Statistics and Indicators on Gender Issues

Lecture on statistics and indicators on gender issues
The lecture is based on Chapter 3. It should start with a short presentation of the flowchart ‘Gender Statistics. The Production Process’.

In the following lectures, during the entire workshop, reference should be made to the flowchart indicating the step in the production process to which the topics presented refer (an indication is provided by the flowchart reported in the beginning of each chapter of this book).

Working group exercise 2: Identification of needed statistics and indicators on gender issues
The exercise is completed in two parts. In part 1, the same problem used in working group exercise 1, part 1 is used by all groups to identify the needed statistics. The groups present their reports in plenary followed by discussion and clarification from the resource persons.

In part 2, each group should identify the needed statistics for the problem used in working group exercise 1, part 2 and also group the statistics by field.

After the group reports have been presented and discussed in plenary, the resource persons review and edit the list of needed statistics by field. The revised documents should be inputs to working group exercise 5 (see below).
III. Availability and Quality of Data
Lecture on availability and quality of data
The lecture is based on Chapter 4.

Working group exercise 3: Assessment of availability and quality of data needed
In the previous group work, participants conducted analyses on a problem in a specific area, looking at its underlying causes and effects. Then, they identified and grouped needed statistics by field. In this exercise each group should identify for each statistics listed, whether it is available, in which form and from which source. Quality aspects with respect to gender issues should be discussed. The results of the group discussions are presented in plenary.

IV. Analysis and Presentation of Gender statistics
Lecture on analysis and presentation of gender statistics
Chapter 5 forms the basis of the lecture. Examples (bad, good, better, best) should be presented to explain ‘Construction of Tables and Graphs’.

Working group exercise 4: Analysis and presentation of gender statistics
The exercise is completed in two parts. In part 1, the same statistical table, with absolute numbers for women and men presented for two variables (e.g. educational attainment by age or marital status by age) is given to all groups. The groups should identify a gender concern that the statistics could be used to highlight, analyse the table and present statistics in a user friendly way, exploring as many ways of presenting the data as possible. The groups present their reports in plenary followed by discussion and clarification from the resource persons.

In part 2, the problem/concern related to gender used for working groups 1–3 and the outputs of these exercises should be used. The group should use the data brought to the workshop to analyse the problem and its underlying causes and effects.

The groups’ reports are presented and discussed in plenary. The presentations should follow the same format as part 1.

V. Gender Statistics Products
Lecture on gender statistics products
The lecture is based on Chapter 6 with some reference to the section ‘Users of statistics’ in Chapter 3. Examples of gender statistics products from various countries should be presented and also be available as reference material during the workshop.

Plenary discussion
The participants should discuss:
(a) Different users and their needs for various gender statistics products in the country.
(b) A plan for a one-day seminar to present and disseminate a gender statistics booklet. The discussion should focus on defining the goal of the seminar, and identifying participants, venue, programme (topics and lectures, resource persons, discussions, etc.)
VI. Plan for Work with Gender Statistics

Lecture on development of a plan for work with gender statistics
The lecture will be based on Chapter 3 with some reference made to Chapter 1. Also, the session ‘Preparation of a publication on gender statistics’ in Chapter 6 is presented.

Working group exercise 5: Plan for work with gender statistics
The groups should develop a plan for further work with gender statistics. The plan should include activities needed to produce, present and disseminate a popular statistical booklet on women and men for their country. The plan should also include a report on needs to improve the official statistical system to better reflect gender issues. Such needs will be identified during the production of the statistical publication.

As a guide for the trainer, an outline for a plan for improving gender statistics at the country level, is presented in appendix 1.

The suggested plans will be presented by the groups in plenary for discussion. Agreement will be reached on a draft plan for further work with gender statistics in their country. The plan should include a popular statistical booklet on women and men and a report on needs to improve gender statistics in the country.

Closing Session
Before the closing ceremony an evaluation of the workshop should be done, based on evaluation questionnaires and a plenary discussion. It is important to assess whether the workshop met participants’ expectations. Also, organizers and trainers should draw on participants’ impressions and comments to improve the training material, contents and organization of future workshops.

The evaluation should include participants’ views on the following:
Preparatory and introductory work
- Introductory information about the workshop
- Clarity of instructions and adequacy and usefulness of preparations for the workshop
For each of Sessions I-VI
- Lectures
- Working group exercises
- Plenary discussions
For the workshop as a whole
- If some part(s) was(were) more/less valuable than others
- If more/less time should be devoted to any of the topics
- If more/less time should be devoted to lectures/working group discussions/plenary discussions
- Which experiences from the workshop will be most useful for their future work with gender statistics
- Workshop material
- Resource persons and organizers
- Organization of the workshop (logistics)

The participants should also be asked to give suggestions for improvements of contents and organization of similar workshops in the future.

Evaluation of separate sessions can preferably be done during the workshop, based on questionnaires distributed after each session. A first questionnaire could also be given to the participants at the registration and cover preparatory and introductory work and expectations from the workshop. The last questionnaire, covering the workshop as a whole, should then be completed by participants and used as a basis for the discussion at the closing session together with the information in earlier questionnaires.
Introduction
In all countries and regions of the world, regardless of development and socio-economic system, women and men are still far from equity.

A clear identification of problems/concerns related to gender and the underlying causes is necessary for formulation of policies and programmes and for effective implementation of programmes and projects.

To better understand the interdependence between different problems/concerns these should be classified into areas and their underlying causes identified. This also simplifies comparisons between countries.

The task of the working group
The working group will discuss a gender issue related to the policy area ‘economic life’.

The problem to be discussed is:
Occupational segregation in the labour force with women in lower status occupations than men.

1. Identify the most important underlying causes of the problem.
2. Identify the most important consequences/effects of the problem.

Report in the following format:

<table>
<thead>
<tr>
<th>Underlying causes</th>
<th>Consequences/effects</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>1.</td>
</tr>
<tr>
<td>2.</td>
<td>2.</td>
</tr>
<tr>
<td>3.</td>
<td>3.</td>
</tr>
<tr>
<td>4.</td>
<td>4.</td>
</tr>
</tbody>
</table>

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Problem/concern
Occupational segregation in the labour force with women in lower status occupations than men
The task of the working group

The main problems and concerns related to gender can be classified into the following areas:

A. Family life
B. Economic life
C. Decision making
D. Education
E. Health
F. Other issues

Each working group is assigned one area.

The working group will present the main problems and concerns in gender and development in their countries in the area assigned. It will also present the underlying causes and effects and the national goals related to one of the gender concerns identified.

1. Study the material on gender issues for the country/brought to workshop/prepared for the workshop/presented at the workshop.

2. Extract from this material five problems/concerns related to gender issues.

3. Choose one of the problems/concerns and identify the most important underlying causes and effects of the problem.

4. Extract from the material the goals related to the problem as they appear in the national development plan/policies on women.

Report points 2 and 4 together.

Report point 3 in the same format as part 1.
Introduction
Once a problem/concern related to gender and its underlying causes is identified accurate statistical information is needed to develop appropriate policies and programmes and to monitor and evaluate programmes and projects. In fact, statistics are also needed to identify problems and their causes.

Users and producers should work together to identify needed statistics and indicators on specific problems/concerns. Users will often need information from more than one statistical field.

The task of the working group
During working group exercise 1, part 1, the underlying causes and effects of the problem Occupational segregation in the labour force with women in lower status occupations than men were identified. The result of the plenary discussion is distributed to all groups.

The working group will identify statistics and indicators needed for the analysis of this problem and its underlying causes and effects.

NOTE: Make sure you list all statistics and indicators needed. Do not restrict your listing to available statistics.

Present the statistics and indicators in the following format:

Needed statistics and indicators
For the problem/concern:

Occupational segregation in the labour force with women in lower status occupations than men

(a)
(b)
(c)

etc.

For underlying cause number:
1. (give the name)
   (a)
   (b)
   (c)
   etc.

2. (give the name)
   (a)
   (b)
   (c)
   etc.

For consequence/effect number:
1. (give the name)
   (a)
   (b)
   (c)
   etc.

2. (give the name)
   (a)
   (b)
   (c)
   etc.
The task of the working group

National problems/concerns related to gender, classified under the areas A-F of gender issues, were identified during working group exercise 1, part 2. These problems have been compiled into a list of national gender issues. Each group was assigned a policy area and requested to conduct a deeper analysis on a chosen problem, to identify underlying causes and effects.

The group will identify needed statistics and indicators for the problem they analysed during working group exercise 1, part 2.

1. Present the statistics and indicators in the same format as in part 1 above.

Some of the identified statistics are common to many problems and they stem from different statistical fields. To simplify the compilation of statistics related to the various problems identified by the groups, statistics should be grouped by statistical field.

2. List the statistics identified under point 1 using the following headings and be careful to avoid duplication:

Statistical fields

1. Population
2. Families and households
3. Work
4. Economy
5. Education
6. Health
7. Crime
8. Decision making
Introduction
Once the statistics and indicators needed to analyse gender concerns are identified, their availability and quality have to be assessed.

Different situations are possible
1. Data are collected, tabulated and published in different forms including yearbooks, booklets, CDs, diskettes.
2. Data are collected and tabulated, but not published (can only be obtained by specific request).
3. Data are collected, but not tabulated (available only on the original record tapes and obtained by specific request).
4. Data are collected, but not entered into the computer (available only on paper questionnaire).
5. Data are not collected at all or not collected by sex.

Concepts and definitions as well as measurement methods used in the collection of data can introduce biases in gender analysis and even make such analysis impossible.

The task of the working group
The group will discuss the availability and quality of the statistics identified as needed by the group in exercise 2, part 2.

List for each statistics:
1. Whether it is available, in which form and from which source.
2. The quality aspects with respect to gender issues.
Introduction
Statistics on women and men are usually not available in a form accessible to those who are interested in gender issues. The statistics are often difficult to find as they are spread over many different subject matter fields and the complex tables in which they are presented are of limited use to most potential users.

However, statistics can indeed be presented in a very appealing, interesting and easily understood way through simple tables and charts together with a short explanatory text.

The task of the working group
A statistical table presenting two variables with absolute numbers for women and men is distributed to the working groups.

The group will:
1. Identify a gender concern that could be addressed by these statistics.
2. Analyse the table and present statistics in a way that is simple and easy to understand for all kinds of users, exploring as many ways of presenting the data as possible.
3. Take notes on the steps followed to reach the final output, showing the measures taken to simplify and make the presentation clear and direct.

Report in the following format:
Present the tables and graphs on transparencies and give an oral presentation of the analysis.
The task of the working group

The group will work on the problem/concern related to gender used by working groups 1–3 and use the outputs of these exercises.

The data brought to the workshop should be used to analyse the problem and its underlying causes and effects.

Present the statistics and indicators in a way that non-statisticians find easy to grasp, following steps 2–3 in part 1.

Report in the same way as in part 1.
Plan for Work with Gender Statistics

Introduction
The purpose of the workshop is to train those assigned to or expected to be core members of a working group on gender statistics in their country. Important parts of the work to improve gender statistics are the production of statistical publications on the situation of women and men and reports on needs to improve gender statistics in the country.

A national statistical booklet on women and men has proved to be an important tool to promote work related to gender concerns in a number of countries. Statistics and indicators, presented in a way that non-statisticians find easy to grasp, and showing basic information on the situation of women compared to men in all spheres of society, can reach a large audience.

A report on needs to improve gender statistics should be prepared on the basis of the work to produce the statistical booklet. This report should identify activities within areas of work and provide strategies to improve gender statistics.

The areas of work could be:
- Improve ways to present and disseminate available statistics.
- Improve measurements, concepts, definitions and classifications.
- Improve production of statistics to eliminate data gaps.

The task of the working group
The group should develop the plan for the preparation of:

A. A statistical booklet on women and men for their country.
B. A report on needs for improvement of gender statistics.

The plan for A and B should contain the following:

(a) Objectives
(b) Institutional arrangements
(c) Activities (including time allowed and responsible person/organisation for the activity).

NOTE: Specify how you plan to establish and maintain the communication between producers and potential users of gender statistics throughout the entire process.
In the following suggestions are given on objectives, outputs and activities needed to produce a national gender statistics booklet and a report on need for improvement of gender statistics in the country.

**Objectives**

A. The medium term (developmental)
   To strengthen the gender responsiveness of the national official statistical system

B. Short term objectives (*Specify time period*)

1. Identify the goals for development for women relative to men in the stated country;
2. Identify statistics and indicators needed in different areas related to gender issues in this country;
3. Evaluate existing official statistics with respect to their gender responsiveness and identify deficiencies;
4. Present statistical information on gender issues for this country for a broad audience, nationally and internationally;
5. Present a report with actions to be taken.

**Outputs**

1. A statistical publication (booklet) on ‘Women and Men in Country X’ (*specify year*) for wide dissemination. Ready (*specify month and year*);
2. A report on needs to improve the entire statistical system in the country to fully reflect gender issues in society. Ready (*specify month and year*).

Producers and users of gender statistics will participate in dialogues and consultations to reach the objectives. This includes consultations with experts on gender issues in the country and workshop(s) with potential users to discuss the draft booklet.
Activities

1. Establish a Project Steering Committee for the overall planning, coordination and implementation of the project.

2. Establish a Working Group

3. Consult with users and producers of statistics to identify:
   (a) Urgent gender issues in society;
   (b) Statistics and indicators needed relating to the identified urgent gender concerns including priority as to which statistics should be presented to give a broad overview of the situation today;

4. Prepare a report on:
   (a) Urgent gender issues in society;
   (b) The needed statistics and indicators which emanated from the identification of these urgent gender concerns. This report should also state priorities, i.e., which statistics should be presented first.

5. Assess availability of needed data and collect these data. This activity will include taking notes on the quality of existing data and the presence of any data gaps (input to activity 7).

6. Prepare a publication (booklet) for wide dissemination in the national language and in English.
   (a) Prepare a draft booklet;
   (b) Conduct workshop(s) with users and producers of gender statistics to discuss the draft;
   (c) Finalize the draft;
   (d) Prepare a plan for dissemination;
   (e) Print the booklet;
   (f) Implement the plan for dissemination.

7. Prepare a report on deficiencies.
   (b) Conduct workshop(s) with users and producers of gender statistics to discuss the draft report;
   (c) Finalize the draft;
   (d) Prepare a plan for dissemination;
   (e) Print the report;
   (f) Implement the plan for dissemination.

8. Prepare a plan to address the deficiencies for government adoption and the procurement of funds.

Indicate for each activity the responsible organization/person and the time period (date of beginning and end).
Footnotes

2. Gender Issues

1 The distinction between gender and sex was first formalized by Gayle Rubin in 1975. See also Caroline O.N. Moser, Gender Planning and Development. Theory, Practice and Training. New York: Routledge and London, 1993.


3. Statistics and Indicators on Gender Issues


4. Data Availability and Quality

Further Reading

Publications on gender issues

Publications and manuals on statistics

International gender statistics books

Regional gender statistics books


National gender statistics books

National gender statistics booklets produced by statistical offices during the 1990’s in the following countries
Botswana 1991
China 1995
Chile 1995
Ethiopia 1992
Iceland 1994
Indonesia 1995
India 1995
Kenya 1996
Lesotho 1993
Mozambique 1995
Namibia 1995
Norway 1995
Pakistan 1995
Philippines 1995
Sri Lanka 1995
Sweden 1996
Tanzania 1992
Thailand 1995
Zambia 1991
Zimbabwe 1991
Vietnam 1995
Organizations Working on Gender Issues and Development

Almost every country in the world today has a bureau dealing with women’s or gender issues. International and national development agencies also have units responsible for ensuring that gender issues are integrated into all development activities and that women and men equally benefit from development projects. Non-governmental organizations working to improve the status of women have also proliferated.

International organizations

Many offices in international organizations provide support to women in different sectors and promote gender programmes in countries.

UNIFEM

The United Nations Development Fund for Women (UNIFEM), created in 1985, is the agency responsible for supporting activities to benefit women and for acting as catalyst for other agencies to ensure women’s involvement with mainstream activities.

The basic principle in UNIFEM’s approach is ‘a commitment not to do something for women, but to facilitate what women want and are doing for themselves’. This strategy is defined as mainstreaming. Mainstreaming has assumed a conceptual and strategic connotation in the history of the women in development (WID) movement and represents a break from the previous experience and failures in achieving WID goals.

The idea of mainstreaming is essentially that of ‘bringing about desired change by influencing decisions at the highest levels’ and ‘strengthening of women’s involvement in development; interfacing women’s capabilities and contributions with macro-development issues such as environment, critical poverty, population, debt and adjustment, food scarcity, energy and urbanization by drawing on large scale resources for development which have not hitherto articulated support or programmatic linkages with women’. UNIFEM has identified the lack of adequate data as an important constraint on effective mainstreaming and the need for adequate data as a basis for macro-planning, that show women’s and men’s needs and characteristics in different locations and different socio-economic groups.

INSTRAW

The International Research and Training Institute for the Advancement of Women (INSTRAW) was established following the recommendations of the 1975 World Conference on Women, to promote women as key agents of development, to improve training of women and to improve and disseminate information on their status in the world.

INSTRAW’s mandate is to promote the full participation of women in all aspects of development through research, training and information. INSTRAW has devoted a large share of its work to the improvement and dissemination of gender statistics. It has contributed to the publication of several manuals on this field and sponsored and organized workshops to improve communication between users and producers of statistics.

Among its numerous activities INSTRAW publishes a Newsletters – in English, Spanish and French – to promote networking on women in development issues at a global level; it sponsors scholarships and internships; and publishes several books in its main areas of work.

DAW

The Division for the Advancement of Women, Department for Policy Coordination and Sustainable Development, represents the UN focal point

for the implementation of the Beijing Platform and conducts research on gender in different areas and a number of other activities to review and monitor countries’ progress in achieving equality between women and men.

UNFPA
Within the United Nations Fund for Population (UNFPA), the office responsible for activities concerning women is the Women, Population and Development Branch. The Branch carries out activities to create awareness and to provide guidance and technical support, working closely with focal points in the field.

UNICEF
Within the United Nations Children’s Fund (UNICEF), the unit responsible for the integration of women’s concerns in the agency’s programmes is the Section for Development Programmes for Women. The unit provides support to programmes in countries, by monitoring and evaluating programmes and projects and promoting ideas and strategies. UNICEF strategy stresses the importance of an integrated approach where women’s needs and concerns are incorporated into national and sectorial plans. Special attention is given to the need for data collection on women participation in health, nutrition and health-care and sanitation programmes.

UNDP
In the United Nations Development Programme (UNDP), the Gender in Development Programme – part of the Human Development Group of the Programme Development And Support Division – focuses on the development of policies and guidelines for the integration of WID concerns into country programming and project preparation and is responsible for the training of staff on gender analysis.

Other international agencies
All other UN agencies and intergovernmental organizations have established a unit that deals with gender issues. The Women and Population Division at FAO works at different levels, including assisting in collection, presentation and dissemination of gender-specific data in agriculture and rural development. WHO has a programme on Women, Health and Development where a focal point, supported by a steering committee, helps plan activities and coordinate support. The Women in Development Division of the World Bank is responsible for initiatives addressing gender issues. The focus is on increasing women’s economic productivity by investing in human capital and improving women’s access to productive resources and the labour market.

The European Union has an Equal Opportunity Unit, within the Directorate-General V that prepares the Commission’s equal opportunity projects, coordinates the work with the committees and networks and disseminates information on equal opportunity issues.

National development agencies
Bilateral donor agencies often have a well established gender and development unit and/or programme. Examples of agencies very active in this field are the Swedish International Development Cooperation Agency (Sida), the Finnish Ministry of Foreign Affairs, the United States Agency for International Development (USAID), and the Canadian International Development Agency (CIDA).

Non-governmental organizations
Non-governmental organizations have also contributed to the development and success of gender programmes and projects in countries. In all regions, NGOs execute projects, disseminate information and provide an invaluable link between grass-root and international levels. Some of these NGOs specialized in gender issues, some are women’s organizations, others have a broader scope of activities and include the work on gender issue in their overall programmes.
Annex 2

Paragraphs concerning Gender Statistics in the Beijing Platform for Action 1995


Strategic objective A.4. Develop gender-based methodologies and conduct research to address the feminization of poverty.

Actions to be taken

69. By Governments, intergovernmental organizations, academic and research institutions and the private sector:

(a) Develop conceptual and practical methodologies for incorporating gender perspectives into all aspects of economic policy-making, including structural adjustment planning and programmes;

(b) Apply these methodologies in conducting gender-impact analyses of all policies and programmes, including structural adjustment programmes, and disseminate the research findings.

70. By national and international statistical organizations:

(a) Collect gender and age-disaggregated data on poverty and all aspects of economic activity, and develop qualitative and quantitative statistical indicators to facilitate the assessment of economic performance from a gender perspective.

(b) Devise suitable statistical means to recognize and make visible the full extent of the work of women and all their contributions to the national economy, including their contribution in the unremunerated and domestic sectors, and examine the relationship of women’s unremunerated work to the incidence of and their vulnerability to poverty.

Strategic objective D.2. Study the causes and consequences of violence against women and effectiveness of preventive measures

Actions to be taken

130. By Governments, regional organizations, the United Nations, other international organizations, research institutions, women’s and youth organizations and nongovernmental organizations, as appropriate:
(a) Promote research, collect data and compile statistics, especially concerning domestic violence relating to the prevalence of different forms of violence against women and encourage research into the causes, nature, seriousness and consequences of violence against women and the effectiveness of measures implemented to prevent and redress violence against women.

(b) Disseminate findings of research and studies widely.

(c) Support and initiate research on the impact of violence, such as rape, on women and girl children and make the resulting information and statistics available to the public.

Strategic objective F.1. Promote women’s economic rights and independence, including access to employment and appropriate working conditions and control over economic resources

Actions to be taken

167. By Governments:

(g) Seek to develop a more comprehensive knowledge of work and employment through, inter alia, efforts to measure and better understand the type, extent, and distribution of unremunerated work, particularly work in caring for dependents and unremunerated work done for family farms or businesses, and encourage the sharing and disseminating of information on studies and experience in this field, including the development of methods for assessing its value in quantitative terms, for possible reflection in accounts that may be produced separately from, but consistent with, core national accounts;

G. Women in power and decision-making

189. The equitable distribution of power and decision-making at all levels is dependent on Governments and other actors undertaking statistical gender analysis and mainstreaming a gender perspective in policy development and the implementation of programmes. Equality in decision-making is essential to the empowerment of women. In some countries, affirmative action has led to 33.3 per cent or larger representation in local and national governments.

190. National, regional and international statistical institutions still have insufficient knowledge of how to present the issues related to the equal treatment of women and men in the economic and social spheres. In particular, there is insufficient use of existing databases and methodologies in the important sphere of decision-making.

Strategic objective G.1. Take measures to ensure women’s equal access to and full participation in power structures and decision-making

Actions to be taken

192. By Governments:

(e) Monitor and evaluate progress on the representation of women through the regular collection, analysis and dissemination of quantitative and qualitative
data on women and men at all levels in various decision-making positions in
the public and private sectors, and disseminate data on the number of women and
men employed at various levels in Governments on a yearly basis; ensure that
women and men have equal access to the full range of public appointments and
set up mechanisms within the governmental structures for monitoring progress in
this field.

195. By the United Nations:

(c) Continue to collect and disseminate quantitative and qualitative data on
women and men in decision-making and analyse their differential impact on
decision-making and monitor progress towards achieving the Secretary-General’s
target of having women hold 50 per cent of managerial and decision-making
positions by the year 2000.

Strategic objective H.1. Create or strengthen national machineries and other
governmental bodies

Actions to be taken

205. By governments:

(c) Provide staff training in designing and analysing data from a gender
perspective.

Strategic objective H.3. Generate and disseminate gender-disaggregated data
and information for planning and evaluation

Actions to be taken

209. By national, regional and international statistical services, and
relevant governmental and United Nations agencies, in cooperation with
research and documentation organizations, in their respective areas of
responsibility:

(a) Ensure that statistics related to individuals are collected, compiled,
analysed and presented by sex and age, and reflect problems, issues and
questions related to women and men in society;

(b) Collect, compile, analyse and present on a regular basis data
disaggregated by age, sex, socio-economic and other relevant indicators,
including number of dependants, for utilization in policy and programme
planning and implementation;

(c) Involve centres for women’s studies and research organizations in
developing and testing appropriate indicators and research methodologies to
strengthen gender analysis, as well as in monitoring and evaluating the
implementation of the goals of the Platsform for Action;

(d) Designate or appoint staff to strengthen gender-statistics programmes and
ensure coordination, monitoring and linkage to all fields of statistical work,
and prepare output that integrates statistics from the various subject areas;
(e) Improve the data collection on the full contribution of women and men to the economy, including their participation in informal sector(s);

(f) Develop a more comprehensive knowledge of all forms of work and employment by:

(i) Improving data collection on the unremunerated work which is already included in the United Nations System of National Accounts, such as in agriculture, particularly subsistence agriculture, and other types of non-market production activities;

(ii) Improving measurements that at present underestimate women’s unemployment and underemployment in the labour market;

(iii) Developing methods, in the appropriate forums, for assessing the value, in quantitative terms, of unremunerated work that is outside national accounts, such as caring for dependants and preparing food, for possible reflection in satellite or other official accounts that may be produced separately from but are consistent with core national accounts, with a view to recognizing the economic contribution of women and making visible the unequal distribution of remunerated and unremunerated work between women and men;

(g) Develop an international classification of activities for time-use statistics that is sensitive to the differences between women and men in remunerated and unremunerated work and collect data, disaggregated by sex. At the national level, subject to national constraints:

(i) Conduct regular time-use studies to measure, in quantitative terms, unremunerated work, including recording those activities that are performed simultaneously with remunerated or other unremunerated activities;

(ii) Measure, in quantitative terms, unremunerated work that is outside national accounts and work to improve methods to accurately reflect its value in satellite or other official accounts that are separate from but consistent with core national accounts;

(h) Improve concepts and methods of data collection on the measurement of poverty among women and men, including their access to resources;

(i) Strengthen vital statistical systems and incorporate gender analysis into publications and research; give priority to gender differences in research design and in data collection and analysis in order to improve data on morbidity; and improve data collection on access to health services, including access to comprehensive sexual and reproductive health services, maternal care and family planning, with special priority for adolescent mothers and for elder-care;
(j) Develop improved gender-dissaggregated and age-specific data on the victims and perpetrators of all forms of violence against women, such as domestic violence, sexual harassment, rape, incest and sexual abuse, and trafficking in women and girls, as well as on violence by the agents of the State;

(k) Improve concepts and methods of data collection on the participation of women and men with disabilities, including their access to resources.

210. By Governments:

(a) Ensure the regular production of a statistical publication on gender that presents and interprets topical data on women and men in a form suitable for a wide range of non-technical users:

(b) Ensure that producers and users of statistics in each country regularly review the adequacy of the official statistical system and its coverage of gender issues, and prepare a plan for needed improvements, where necessary;

(c) Develop and encourage the development of quantitative and qualitative studies by research organizations, trade unions, employers, the private sector, and non-governmental organizations on the sharing of power and influence in society, including the number of women and men in senior decision-making positions in both the public and private sectors;

(d) Use more gender-sensitive data in the formulation of policy and implementation of programmes and projects.

211. By the United Nations:

(a) Promote the development of methods to find better ways to collect, collate and analyse data that may relate to the human rights of women, including violence against women for use by all relevant United Nations bodies;

(b) Promote the further development of statistical methods to improve data that relate to women in economic, social, cultural and political development;

(c) Prepare a new issue of *The World’s Women* at regular five-year intervals and distribute it widely;

(d) Assist countries upon request in the development of gender policies and programmes;

(e) Ensure that the relevant reports, data and publications of the Statistical Division of the United Nations Secretariat and INSTRAW on progress at the national and international levels are transmitted to the Commission on the Status of Women on a regular and a co-ordinated fashion.

212. By multilateral development institutions and bilateral donors:

Encourage and support the development of national capacity in developing countries and in countries with economies in transition by providing resources and technical assistance so that countries can fully measure the work done by women and men, including both remuner-
Annex 3

Statistics and Indicators on Gender Issues

Examples from national gender statistics publications

All statistics should be presented by sex, that is for girls and boys, women and men.


Population
Changes in population 1890–1993
Age distribution 1890, 1940, 1994 and 2025 (projection)
Population by age 1900–2025
Average life expectancy at birth 1885–1994
Total fertility rate 1890–1994
 Abortions performed 1951–1994
Sterilizations performed 1960–1993
Family units by type 1992/1993
Family units with cohabiting and single adult by number of children 1992/93
Cohabiting persons in ages 16–84 by age 1992/1993
Single persons in ages 16–84 by age 1992/1993
Individuals by marital status and age 1994

Health
Disorders or symptoms among ages 16–84 years 1992/1993
Daily smokers by age and marital status 1992/1993
Smoking and use of snuff among school pupils 1994
Sickness days per insured person by age 1993
Sales by prescription by medical group 1994
Deaths by cause 1993
Infant mortality 1885–1994
Mortality rate by cause and age 1993

Education
Level of education ages 25–64 years, January 1 1994
Graduated from post-secondary education by field 1993/1994
Graduated from theoretical programmes in upper secondary education 1993/1994
Graduated from vocational programmes in upper secondary education 1993/1994
Teachers by level of school 1993/1994

Time use
Time use among ages 20–64 1990/1991
Time for work among ages 20–64 1990/1991
Time for unpaid work by life cycle 1990/1991
Leisure time among ages 20–64 1990/1991

Leisure time by life cycle 1990/1991

Child care
Care of children ages 1–6, Spring 1994, and ages 7–9 and 10–12, 1992/1993 by form of care
Children ages 1–6, with and without municipal childcare, Spring 1994 by type of family
Children registered in pre-schools and after-school hour centres 1970–1993
Children with/without municipal day care 1970–1993
Compensated days with parental insurance 1974–1993
Insured persons who used parental insurance 1985–1993

Gainful employment
Population ages 20–64 by activity status 1994
Economic activity rate by age 1970–1994
The thirty largest occupations 1990 ranked by numbers within occupation
The thirty largest occupations 1990 ranked by average wage/salary
Employees ages 16–64 by industry and sector 1994
Self-employed ages 16–64 by industry 1994
Hours worked per week for persons in different types of households 1994
Employed with children under 17 years 1994
Absence rate by reason 1994
Hours of absence by reason 1994
Working conditions in working life 1993
Pain in shoulders and arms every week among those who work at computer stations (with monitor, keyboard, etc.) 1989–1993
Unemployment rate by age 1994
Long-term unemployed by length of unemployment and age 1994
Unemployment rate by age 1970–1994

Wage/Salary
Development of wages and salaries 1973–1993
Women’s wages/salaries in per cent of men’s 1973–1993
Salaried employees in private sector by occupational level 1993
**Income**
Income from work of employees in ages 20–64 by hours worked 1992
Income-earners in ages 20 years and over by income group 1993
Total earned and capital income by age group 1993
Disposable income for families in ages 20–64 by type of family 1992
Families with taxable resources including capital by type of family 1993
Households with social assistance 1993
Taxes 1993
Individuals aged 16–64 with earned pension points 1970–1993
Average pension points 1970–1993
Individuals with full pension points (6.5) 1970–1993
Pensioners 65 years and over by type of pension benefit 1992

**Women and Men in Chile. Figures and Reality 1995. Statistics National Institute, Santiago 1995**

**Population and households**
Changes in population 1907–1992
Age distribution 1960, 1982, 1992 and 2025 (projection)
Population by age (0–14,15–64– 65–) 1952, 1992 and 2025
Population by age (0–14,15–64– 65–) and urban/rural 1992
Population by ethnic origin and age 1992
Total fertility rate 1950–1993
Total fertility rate by socio-economic group 1957–1982
Average number of children per woman by mother’s year of birth 1992
Distribution of women in various birth cohorts by their number of children 1992
Legitimate/illegitimate births 1936, 1986 and 1993
Adolescent mothers’ children 1992
Household composition 1992
Marital status by age 1992

**Health**
Life expectancy at birth 1920–1992
Infant mortality rate 1907–1993
Infant mortality rate by cause 1960 and 1993
Maternal mortality rate 1936–1993
Mortality rate by cause and age 1993
Population covered by health insurance by type of system 1992

**Violence and crime**
Assaults reported to the police 1993
Assaults with known offender, reported to the police 1993
Fear of violence and actual violence 1992/1993
Persons found guilty of crimes 1993
Persons found guilty of crimes against the Criminal Code 1993

**Influence and power**
Nominated and elected to Parliament 1994
Elected to Parliament by party, September 1994
Composition of Parliament 1919–1994
Elected to Parliament by age 1994
Parliamentary committees 1994
Top officials in ministries, November 1994
Chairpersons by party, April 1995
Elected to Municipal Councils by party 1994
Elected to County Councils by party 1994
Managers and all employees within public/private sector 1990
Trade unions members 1995
Elected officials 1995
Members of European Parliament, March 1995

**Education**
Illiteracy rate ages 10 and over by urban/rural 1920, 1970, 1982 and 1992
Illiteracy rate by age and urban/rural 1992
Years of studies ages 25 and over 1970, 1982 and 1992
Level of education ages 25 and over 1992
Average years of education by age and rural/urban 1990
Enrollment by level of school 1992 1993
Permanence (pass, fail and drop out) rates by level of education and type of institution 1993
Academic aptitude test PAA by score 1993
Special knowledge test by subject for graduates 1993
Registered at universities and professional institutes by field of study 1992
Teachers by type and level of education 1993
Child care
Children ages 0–4 by type of day care 1994
Children ages 0–1 and 2–4 in day care institutions by type of institution 1993
Children attending National Board of Nursery Schools 1986–1993
Employed in living-in household service by sex and age of head of household 1992

Gainful employment
Population ages 20–64 by activity status 1994
Economic activity rate by age 1986-1994
Economic activity rate ages 15 and over by years of education 1994
Economic activity rate for women with/without children by age 1992
Weekly hours worked and absence rate for employed ages 15 and over 1986 and 1994
Employed by status in employment 1994
Employed by industry 1994
Unemployment rate by age and urban/rural 1986–1994
Occupations with concentrations of 78 per cent of those employed 1992 ranked by numbers within occupation
Occupations with concentrations of 78 per cent of those employed 1992 ranked by average wage/salary
Population non-economically active by reason 1986–1994
Population non-economically active by age, urban/rural and reason 1994
Economically/non-economically active by years of education 1994

Income
Women’s income in per cent of men’s by type of income 1990–1993
Salaried by segment of minimum income 1993
Employers and self-employed by segment of minimum income 1993
Average monthly income of employed by level of education 1993
Average monthly income of employed by age 1993
Average monthly household income by sex of head of household 1993
Employed included in the AFP pension fund system by salary 1994
Pensioners by type of pension 1994

Crime, accidents and violence
Detained, investigated and convicted 1994
Sentenced by type of crime 1992
Drivers who caused traffic accidents by age 1994
Traffic accidents 1994
Women and child abuse in metropolitan region 1990–1994
Children stating violence practices of parents by type of practice 1994
Parents violence against children by type of violence 1994

Influence and power
Composition of Parliament 1951–1994
Composition of the Chamber of Deputies and the Chamber of Senators by political party 1994
Parliamentary committees 1994
Top officials in government 1994
Officials in the judicial power 1994
Officials in centralised public administration by post 1994
Monthly salaries of the centralised public sector 1993
Managers in private business 1992
Trade union participation 1993


Population
Annual growth rate and population density 1949–1993
Population by age (0–14, 15–64– 65–) 1953, 1964, 1982 and 1990
Population by age and urban/rural 1990
Average life expectancy at birth 1930-1989
Mean age of population by urban/rural 1964, 1982 and 1990
Migration by reason 1985–1990
Total fertility rate by urban/rural 1952–1990
Children born by number of birth order and urban/rural 1990

Use of contraceptives by method 1973–1993
Induced abortions 1973–1993

Marriage and household
Marital status by age 1990
Marital status ages 15 and over by urban/rural 1990
Age difference between spouses by husband’s age 1990
Average age at first marriage for women ages 15–49
by urban/rural 1949–1992
Marriage and divorce 1978–1993
Average household size by urban/rural 1953–1990
Household composition 1982 and 1990
Single adult household by age 1990
Marital status of single adult household ages 60 and over 1990
Time use
Time use among ages 15–64 by urban/rural 1990
Time spent on housework ages 15–64 by marital status 1990
Time spent on housework ages 15–64 by educational level 1990
Time spent on housework ages 15–64 by employed/unemployed 1990

Employment
Population by activity status (women ages 16–54, men ages 16–59) 1990
Employed by age and urban/rural 1990
Employment rate by age and urban/rural 1990
Employed by occupation 1982 and 1990
Employed by industry 1990
Unemployed by age and reason 1990

Education
Level of education ages 15 and over 1982 and 1990
Mean years of education by age 1982 and 1990
Level of education by age 1990
Illiterate ages 15 and over by urban/rural 1990
Illiteracy rates 15 and over by urban/rural 1990
Students by level 1952–1993
Doctoral and masters degrees 1991–1993
University students by field 1993
Graduates from university by field 1993
Students of specialized secondary schools by type of school 1993
Enrollment rate by level of school 1953, 1964, 1982 and 1990
Teachers by level of school 1993

Health
Infant mortality rate 1975–1990
Child mortality rate 1990
Deaths of children ages 0–14 by cause and urban/rural 1991
Age distribution of dead children ages 0–14 1991
Maternal mortality rate by urban/rural 1989
Place of birth and type of delivery service for children born 1991
Access to safe drinking water by urban/rural 1992
Death rate of top ten diseases by age and urban/rural 1993
Death rate by cause and urban/rural 1988, 1990 and 1993
Smoking by age 1992
Professional health care personnel by occupation 1982 and 1990
Professional health care personnel by occupation and level of education 1982 and 1990

Crime and jurisdiction
Offenders 1986–1993
Persons found guilty of crimes by type of crime 1993
Police and public security staff and legal staff by type 1982 and 1990
Police and public security staff and legal staff by level of education 1982 and 1990

Social participation and policy making
Delegates of National People’s Congress 1954–1993
Leaders by level and type of organization 1990


Population
Population by region 1991
Population by region and urban/rural 1991
Population by size of locality 1991
Population by age 1991
Households 1991 by urban/rural and
(a) source of energy for cooking
(b) source of energy for lighting
(c) type of toilet facility
(d) source of water supply

Work
Employment rate by age 1991
Employment rate by age and urban/rural 1991
Unemployment rate by age 1991
Unemployment rate by age and urban/rural 1991
Population by activity status 1991
Population by activity status and urban/rural 1991
Employed by occupation 1991

Employed by occupation and urban/rural 1991
Employed by industry 1991
Employed by employment status 1991
Employed by employment status and urban/rural 1991
Labour force participation rate by age 1991
Employed by industry and level of education 1991
Unemployed by level of education 1991
Public service employees by salary 1994

Education
Primary school enrollment by age 1991
Primary school enrollment by age and urban/rural 1991
Secondary school enrollment by age 1991
Secondary school enrollment by age and urban/rural 1991
Illiteracy rate by age 1991
Illiteracy rate by age and urban/rural 1991
Adult education by region and level of literacy 1994
Level of education ages 25–64 1991
Primary school drop out rates by grade 1993
Primary school pass rates by grade 1993
Secondary school drop out rates by grade 1993
Secondary school pass rates by grade 1993
Students in technical institutes under NTC courses by subject 1993
Students in grade 12 by subject 1993
Enrollment in special schools 1993
Full-time enrollment at the University of Namibia by course 1993
Persons in the management of the educational system by position 1994
Teachers by level of education 1993
Employed at the University of Namibia by position 1994

Health
Children ages 1–4 with vaccination cards and type of vaccination by age 1992
Children 12–23 months by type of vaccination, urban/rural and mother’s education 1992
Children 0–35 months by breastfeeding status and age 1992
Median duration of breastfeeding for children ages 0–4 by urban/rural and mother’s education 1992
Children ages 0–4 by nutritional status, age, urban/rural and mother’s education 1992
Total fertility rate by urban/rural, mother’s education and employment status 1991
Maternal mortality rate 1992
Women ages 15–49 by age at first birth and current age 1992
Women married at age 15, 18, 20, 22, and 25 by current age 1992
Women’s use of contraceptives by age and method 1992
Married women’s use of contraceptives by method, urban/rural, level of education and number of living children 1992
Infant and child mortality rate by age of mother, urban/rural and mother’s education 1992
Births by type of antenatal care provider, mother’s age, urban/rural and mother’s education 1992
Births by type of birth attendant, mother’s age, urban/rural and mother’s education 1992
Reported cases of HIV infection by age of person in the period 1991–May 1994
Women ages 15–19 who are mothers or pregnant with first child by age, urban/rural and education 1992
Deaths by cause ages 0 and 1–59 months 1992
Health professionals by occupation 1994
Health facilities by type and region 1992
Proximity to health facilities by type and region 1992
Distance to health facilities by type and region 1992

Awareness of availability of health services at nearest health facility/hospital 1992

Law and order
Legal employees in the Ministry of Justice by position 1994
Members of legal institutions by type of institution 1994
Employees in the Namibian Police by position 1994
Employees in the Prison Department by position 1994
Prison receptions by type and duration 1993
Prisoners by type 1993
Juveniles in prison by age 1994
Reported rape and attempted rape cases by police district 1992–1994
Women and child abuse referrals by age and type of offence July 1993–June 1994
Criminal cases reported by sex and age of victim and type of offence July 1993–June 1994

Resources (all statistics by sex of head of household 1993)
Households by main source of income
Households by level of economic resources
Households by size
Households by by education of head of household
Households by walking distance to primary school
Households by poverty indicator
Total monthly household consumption by main item of consumption
Monthly household consumption by type
Households by type of restriction for not earning more money
Households by type of access to communication facility
Households by walking time to public transportation
Households by type of possession/access to income generating facility
Households by standard of house
Households by use of electricity for lighting
Households by walking time to source of drinking water
Average annual household consumption by major items

Decision making
Senior positions in government by type 1995
Regional and local government elected officials by level 1992
Candidates for regional and local authority elections 1992