

Chapter 3

Education

Key findings

- Despite progress, only one in two children in developing regions receive pre-primary education compared to nine in 10 in developed regions.
- Primary school enrolment at the appropriate age is nearly universal in most regions, except sub-Saharan Africa and Oceania.
- Yet, an estimated 58 million children of primary school age—31 million of whom are girls—are out of school.
- Only 72 per cent of the world's girls and 74 per cent of boys attend secondary school; gender disparities at the secondary level are wider than those at the primary level. In tertiary education globally, enrolments are increasing faster for women than for men.
- The proportion of women graduating in the fields of science and engineering remains low in poor and rich countries alike.
- Women account for 30 per cent of all researchers.
- Women account for about two thirds of teachers at the primary level, 52 per cent at the secondary level and 42 per cent at the tertiary level.
- Nearly two thirds of the world's 781 million illiterate adults are women, and almost all of them live in developing regions.
- The vast majority of the world's youth are literate: 87 per cent of young women and 92 per cent of young men having basic reading and writing skills.

Introduction

Education is a core human right¹ and an essential tool for achieving sustainable development.² It is an investment in human capital that confers benefits to both individuals and societies, allowing them to reach their fullest potential. Education is indispensable for closing the gap between women and men in respect to social and economic opportunities and is a key to empowering women and allowing them to become agents of change in economic, social and political spheres. It also improves women's chances of leading a healthy life and passing on the benefits to future generations.³

This chapter presents evidence-based analysis of progress in the education of girls and boys, and women and men, over the period 1990–2012. Overall, the data show remarkable progress

in participation in education and literacy levels. Substantial progress has been made in the achievement of universal primary education, and girls and boys around the world participate equally in primary education in most regions of the world. While the overall progress in secondary education is encouraging, it lags behind primary education. In addition, gender disparities are wider and occur in more countries at the secondary than at the primary level. Among positive global trends, the evidence shows that, girls—once they have access to school—tend to do better than boys in terms of progression at the primary and secondary levels and beyond. In tertiary education, a clear trend is emerging that favours women—with enrolments increasing faster for women than for men. However, gender disparities persist in the fields in which men and women choose to study. Women continue to be underrepresented among graduates in the fields of science and engineering in most countries.

¹ United Nations General Assembly, Universal Declaration of Human Rights, 10 December 1948.

² United Nations, 1994.

³ UNESCO, 2014.

Box 3.1**Gaps in gender statistics on education**

The primary source for cross-nationally comparable statistics on education is the UNESCO Institute for Statistics (UIS). The statistics published by the UIS are based on national data reported to the Institute and estimates made by it. National sources of statistics on participation in education and their outcomes are: school administrative records; population and housing censuses; and, household or other sample surveys.

Availability and data quality issues

Country reporting to the international statistical system is an indication of national capacity to produce and disseminate education data. As the information in the table below indicates, there was a high level of reporting of enrolment data to the UIS for the two periods considered. Out of 211 countries or areas from which the UIS

collects statistics, 192 reported gross enrolment ratios for primary education by sex at least once for the period 2005–2012, while 184 did so for secondary education. Relatively fewer countries or areas (168) reported these ratios for tertiary education, partly because some countries do not have a tertiary education system within their borders. Periodicity in the reporting of the data continues to be a problem for some countries. A smaller number of countries or areas were able to report enrolment frequently (here defined as reporting for at least four out of the eight years considered). One hundred and seventy-five countries or areas frequently reported gross enrolment ratios by sex for primary education in the period 2005–2012, 158 for secondary education, and 125 for tertiary education.

Number of countries or areas for which data on gross enrolment ratios by sex and level of education are available, 1997–2004 and 2005–2012

	Primary		Secondary		Tertiary		Tertiary - Field of study
	At least once	At least 4 years	At least once	At least 4 years	At least once	At least 4 years	At least once
2005–2012							
World	192	175	184	158	168	125	113
Developed regions	46	46	47	46	47	44	42
Developing regions	146	129	137	112	121	81	71
1997–2004							
World	193	177	188	151	164	115	..
Developed regions	46	44	46	41	45	40	..
Developing regions	147	133	142	110	119	75	..

The major source of information on official enrolment levels is school administrative records, which often face data quality issues. In some countries, there is less than universal reporting by schools. In many countries, administrative data cover education in formal public and private institutions. Some educational institutions managed by non-governmental organizations and local communities may not be covered by administrative statistics.^a The reliability of the data reported by government and public schools may be affected by shortcomings, particularly when resource allocation from the government is tied to the size of enrolment.^b Moreover, population estimates are a key component in the calculation

of enrolment ratios. As a result, inconsistencies with population estimates used can affect the calculation of the enrolment ratios.

Literacy and educational attainment statistics are primarily produced from censuses and household surveys. The reporting of education data from these sources is slightly lower than that from administrative records. The total number of countries or areas that have reported adult and youth literacy data by sex from census or survey sources is 158 for the period 2005–2012 and 102 for educational attainment. Fewer countries or areas (108) reported literacy data on older persons. It is important to note that not all of the countries or areas that collected statistics on

^a UNESCO Institute for Statistics, 2004.

^b *Ibid.*

literacy and educational attainment in the 2010 census round (spanning the period 2005–2014) have as yet reported them to the international statistical system. There are differences in the reporting of data on literacy and educational attainment among development groups. Most countries in the more developed regions do not regularly report data on literacy because it is considered virtually universal and thus the information is not collected in their censuses and surveys.

Many factors contribute to data quality issues in the measurement of literacy and educational at-

tainment from censuses and household surveys. The completeness of the census enumeration and the sample design for the household survey may affect the accuracy of estimates produced from these sources. Surveys can also systematically miss parts of the population that are difficult to reach. A lack of consistency in survey questions and methodology may affect results. Because censuses and surveys are carried out infrequently, data from these sources may not be comparable across years and sources, especially in countries where the education system has changed over time.

Number of countries or areas for which data on literacy rates and educational attainment by sex are available, 1995–2004 and 2005–2012

	Adult literacy rates		Youth literacy rates		Literacy rates for older persons		Educational attainment
	1995–2004	2005–2012	1995–2004	2005–2012	1995–2004	2005–2012	2005–2012
World	143	158	143	158	116	108	102
Developed regions	20	25	20	25	17	15	37
Developing regions	123	133	123	133	99	93	65

International comparability

Education systems across the world vary widely. Most countries have their own definitions of education levels that do not easily correspond to the International Standard Classification of Education (ISCED) levels. Consequently, the UIS works with countries to map their education systems to the ISCED classification with a view to improving cross-country and -temporal comparisons. Despite UIS' guidance to countries to exclude data on programmes designed for people beyond regular school age, adult education data may still be included for a few countries, which may slightly affect the comparability of their enrolment data with those of other countries.

The definition and measurement of literacy differ across national censuses and household surveys. Some countries use self-reporting to measure literacy skills, while others rely on direct assessment. Yet, some other countries collect literacy data using proxy measurements based on educational attainment, though estimates produced by such methods are not accepted by the UIS. Some developed countries where basic literacy is considered virtually universal use a new concept that relates literacy to skills needed for successful participation in social and economic life. A lack of common definitions and measurements affect the international comparability of education data.

A. Participation in education

1. Pre-primary education

Early childhood education plays an important role in building a strong foundation for lifelong human development. Evidence from around the world indicates that an early start in education can improve children's chances of participating in and completing higher levels of education. Thus, it can potentially reduce social inequality by offsetting social, economic and language-

based disadvantages.⁴ Early childhood care and education is a diverse area of learning. It ranges, on the one hand, from formal pre-primary education, which is integrated into the national education system via kindergartens where care, play and education are all included, to more informal and often home-based activities. Pre-primary programmes are typically designed for children aged 3 to 5 years, and include organized learning

⁴ UNESCO, 2010.

activities that last, on average, an equivalent of at least two hours per day and 100 days per year.

Only one in two children in developing regions are enrolled in pre-primary programmes, compared to nine in 10 in developed regions

Coverage of pre-primary education has steadily expanded over the period 1990–2012 (figure 3.1). Gross enrolment ratios (GER)⁵ in pre-primary education have increased consistently in all regions of the world for both boys and girls over the same period. Worldwide, pre-primary enrolment rose from 28 to 54 per cent for boys while it increased from 27 to 54 per cent for girls. Overall, participation in pre-primary education was the highest in developed regions. It was also relatively high in Eastern Asia, Latin America and the Caribbean, and Oceania, where the regional averages were above 70 per cent for both boys and girls. Enrolment was low in Northern Africa, sub-Saharan Africa, Western Asia and the Caucasus and Central Asia. Only one in five children in sub-Saharan Africa and Western Asia was enrolled in pre-primary programmes, compared with one in two for developing regions as a whole and about nine in 10 in developed regions.

Gender disparities in pre-primary education were less marked than at other levels of education

Pre-primary education is less marked by gender disparities than any other level of education. This is partly because private institutions account for a large proportion of total pre-primary enrolment. Children participating in pre-primary education tend to come from more affluent groups, where gender biases in education are generally less pronounced than among the poor. With 54 per cent of girls and boys attending pre-primary

⁵ The gross enrolment ratio in pre-primary education is the total number of children enrolled at pre-primary level expressed as a percentage of population at the official age for pre-primary education. A high gross enrolment ratio generally indicates a high degree of participation, whether the pupils belong to the official age group or not. GER can exceed 100 per cent due to the inclusion of over-aged and under-aged students because of early or late entrants. A GER value approaching or exceeding 100 per cent indicates that a country is, in principle, able to accommodate all of its school-age population. However, this is a meaningful interpretation only if one can expect the under-aged and over-aged enrolment to decline in the future to free places for pupils from the expected age group. The achievement of a GER of 100 per cent is therefore a necessary but not sufficient condition for assessing the attainment of universal access for the official age group.

education globally in 2012, the Gender Parity Index (GPI)—the ratio between the female and male pre-primary GERs (see box 3.2)—was within the range of parity at 1.00. Globally, gender parity was maintained between 2000 and 2012. The GPI showed parity in all regions in 2012, except Northern Africa, where 9 girls are enrolled for every 10 boys. A high proportion of countries—112 out of 184 with available data, or 61 per cent—showed gender parity at the pre-primary level.⁶ The largest disparities to the disadvantage of girls (GPI below 0.90) were found in: Montserrat, Morocco, Nauru, Niue, Pakistan, Tajikistan, Turks and Caicos Islands and Yemen. On the other hand, the largest disparities to the disadvantage of boys (GPI above 1.10) were observed in Angola, Armenia, Cayman Islands, Georgia, Saint Kitts and Nevis, Samoa, Senegal and Tuvalu.

Box 3.2

Understanding the gender parity index

The Gender Parity Index (GPI) is commonly used to measure progress towards gender parity in education. For a given indicator, the GPI is calculated as the ratio of the value for females to that for males. A GPI value equal to one indicates parity. This signifies that there is no difference in the indicator for females and males. UNESCO has defined a GPI value of between 0.97 and 1.03 (inclusive) as the achievement of gender parity. For indicators where higher values are desirable (e.g. school participation rates), a GPI of less than one means that girls are at a disadvantage and a GPI greater than one means that boys are at a disadvantage. For indicators where lower values are desirable (e.g. repetition rates), a GPI of less than one means that boys are at a disadvantage and a GPI greater than one means that girls are at a disadvantage. In general, the GPI should be interpreted together with the values of the underlying indicator.

One of the difficulties in presenting the GPI is that the scale of disadvantage for females and males is not represented symmetrically around one. For example, a GPI of 0.5 indicates that the female value of the indicator being reviewed is half the male value, whilst a GPI of 1.5 (also 0.5 units away from parity) indicates the male value of the indicator is two-thirds of the female value (not half).

⁶ Data based on UNESCO Institute for Statistics, 2014. Data shown in Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

2. Primary education

Primary education is fundamental to human development and to the progress of all countries. Providing “universal access to basic education and ensuring the completion of primary education” by both girls and boys is one of the actions all governments must take to address one of the “Critical Areas of Concern—Education and Training of Women”—contained in the Beijing Platform for Action adopted in 1995. This section deals with some key topics in primary education, including participation, progression and completion, while offering an assessment on the extent to which education systems provide equitable access to both boys and girls.

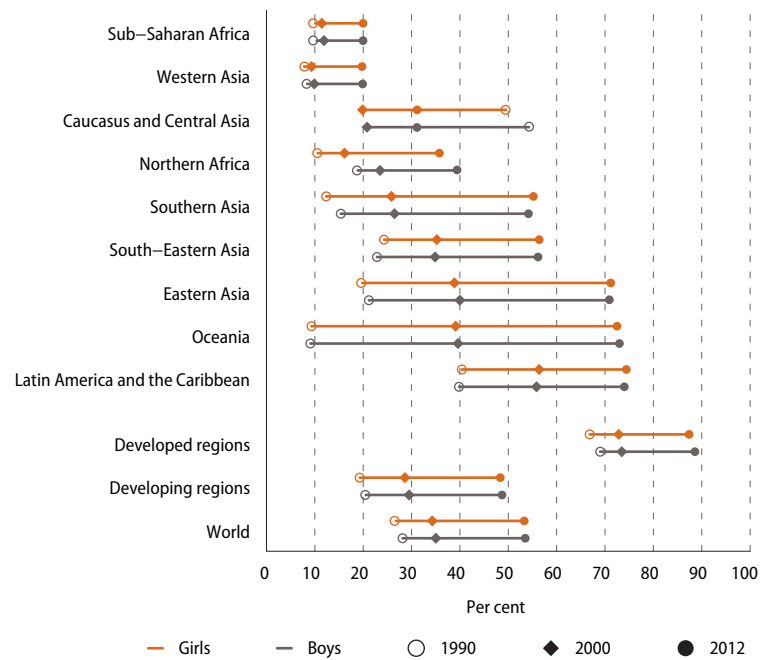
Participation in primary education

Participation in primary education is nearly universal

Between 1990 and 2012, primary education was extended to an ever increasing proportion of the world’s children. Over that period, substantial progress was made towards universal primary education, with the global adjusted net enrolment rate⁷ in primary education rising from 77 to 90 per cent for girls and from 87 to 92 per cent for boys (figure 3.2). The enrolment of girls in primary education has increased faster than that of boys, which helped to close the gender gap at the primary level. This is particularly true in those regions where girls’ enrolment rates were historically much lower than that of boys. Outstanding gains in primary enrolment have been registered in developing regions, particularly in Northern and sub-Saharan Africa, Southern Asia and Oceania. This is largely due to increased investment in primary education and measures taken such as the abolishment of school fees. However, many countries in some of these regions are still far from attaining universal primary education. In sub-Saharan Africa, despite an impressive increase of 27 and 22 percentage points for girls and boys, respectively, over the period 1990–2012, only 75 per cent of primary-school-aged girls and 81 per cent of boys of the same age attended school in 2012. In developed

⁷ The adjusted net enrolment rate is the percentage of children of official primary school age who are enrolled in either primary or secondary education. The indicator is commonly used to assess the level of achievement of the universal primary education goal and to measure the school participation of the official primary-school-age population.

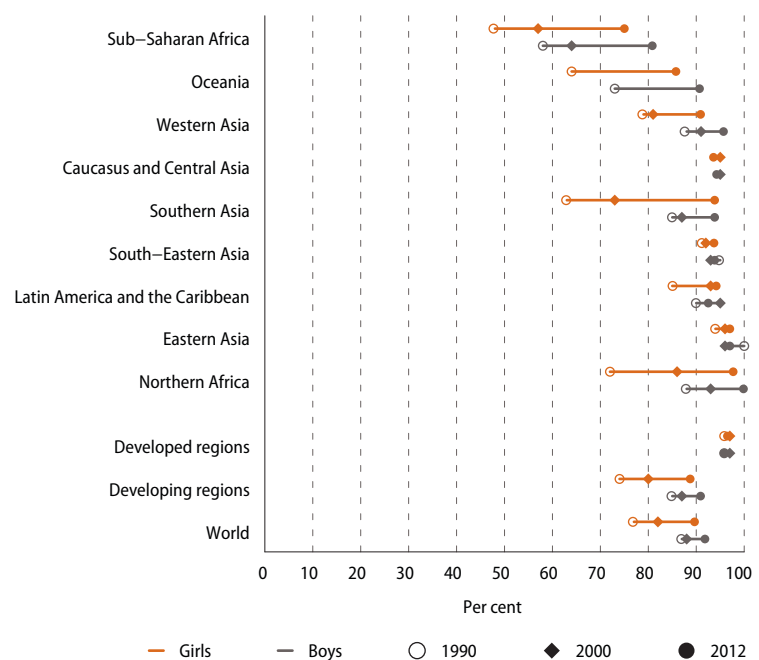
Figure 3.1
Pre-primary gross enrolment ratios by sex and region, 1990, 2000 and 2012



Source: UNESCO Institute for Statistics, 2014.

Note: Regions are listed in ascending order of the pre-primary gross enrolment ratio for girls in 2012.

Figure 3.2
Primary adjusted net enrolment rates by sex and region, 1990, 2000 and 2012



Source: UNESCO Institute for Statistics, 2014.

Note: Regions are listed in ascending order of the primary adjusted net enrolment rate for girls in 2012.

regions, Eastern Asia and Northern Africa, enrolment was nearly universal, with the enrolment rates of girls and boys generally exceeding 95 per cent in 2012. The average rates for both girls and boys exceeded 90 per cent in the Caucasus and Central Asia, Latin America and the Caribbean, South-Eastern Asia, and Southern and Western Asia.

Most countries have reached gender parity in primary education, but in those that have not, disparities to the disadvantage of girls are stark

The GPI⁸ based on GERs⁹ in primary education was 0.97 in 2012. This falls within the range of parity (0.97 to 1.03), implying that, at the global level, boys and girls are equally likely to participate in primary education. The GPI for developed regions, Eastern Asia, Latin America and the Caribbean, South-Eastern Asia, Southern Asia and the Caucasus and Central Asia also fell within the range of parity, and Northern Africa was on the cusp. The average GPI value was lower than the range of parity in sub-Saharan Africa (where the GPI was 0.92), Oceania (0.93) and Western Asia (0.93).¹⁰

The nature and extent of gender disparities in primary enrolment are more apparent at the country level. Worldwide, 192 countries have available data on gross enrolment ratios in primary education for the period 2005–2012. Of these, some 113 countries (about 60 per cent) have reached gender parity, with as many girls as boys enrolled in primary school.¹¹ Of the 79 countries that reported gender disparities in participation in primary education, four out of five (63 countries) reported disparities to the disadvantage of girls. In terms of geographic distribution, 34 of these countries are in Africa, 14 in Latin America and the Caribbean, 7 in Western Asia and 4 in South-Eastern Asia. Large disparities to the disadvantage of girls (a GPI less than 0.90) were found in 21 of the 63 countries, of which 16 were in sub-Saharan Africa, where

⁸ See box 3.3.

⁹ The gross enrolment ratio in primary education is the total number of children enrolled in primary education, expressed as a percentage of the official school-age population in a given year. The GPI of the GER in primary education is expressed as the ratio of the GER for girls to that for boys.

¹⁰ Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

¹¹ *Ibid.*

children's access to school was more limited and the disparities affecting girls more severe. In contrast, there were relatively few countries (16 out of the 79 that showed gender disparities) where boys were at a disadvantage. Moreover, the disparities to the disadvantage of girls are typically more extreme (see also figure 3.8). Poverty is a significant contributing factor, although not the only one, which negatively affects their access to and participation in education. Other factors include ethnicity, disability and residence in rural, remote or scattered communities, slums and in conflict affected areas.¹²

Out-of-school children of primary school age

Most out-of-school children of primary school age live in sub-Saharan Africa and Southern Asia

Great strides have been made towards achieving universal education for all. The global number of out-of-school children¹³ of primary school age¹⁴ declined for two decades, falling from about 104 million in 1990 to about 58 million in 2012—31 million girls and 27 million boys (figure 3.3). Most of these children live in developing regions. Sub-Saharan Africa accounted for more than half (57 per cent) of them and had the highest out-of-school rate of all regions. Almost one in four girls of primary school age and one in five boys in the region had either never attended school or left school without completing primary education. Some 10 million children were out of school in Southern Asia, representing nearly 17 per cent of the global total. Other regions had significantly fewer children out of school: South-Eastern Asia (4 million), Latin America and the Caribbean (3.8 million), Eastern Asia (2.7 million), and Western Asia (1.5 million).

Girls comprise the majority of the out-of-school population

Despite progress towards gender parity in school enrolment, girls comprise the majority of the world's out-of-school children. In 2012, the share

¹² UNESCO, 2007.

¹³ These are primary-school-age children not attending either primary or secondary education, having either not started school or dropped out before completion. They may also be in some type of non-formal education that is not recognized as fully equivalent to formal primary education.

¹⁴ Typically between 6 and 11 years of age.

of girls in the out-of-school population amounted to 53 per cent, down from 62 per cent in 1990. Gender disadvantage was most pronounced in Northern Africa and Western Asia, where girls accounted for over two thirds of children out of school. In sub-Saharan Africa, girls accounted for 56 per cent of such children, while in Oceania the figure was 60 per cent. Over the period 1990–2012, the proportion of girls in the total number of out-of-school children fell to less than one half in Eastern Asia, Latin America and the Caribbean, South-Eastern Asia and Southern Asia.

Poverty and other barriers further reinforce gender disparities in learning opportunities

The reasons why children do not attend school vary, but they are often associated with poverty, ethnicity, social exclusion, living in a rural area or slum, geographic remoteness, disasters, armed conflict, lack of basic facilities and poor-quality education. These barriers often interact with gender to create even greater disadvantages in learning opportunities. Countries face different challenges and need different policies depending on their circumstances. Among interventions that have successfully been used to reach the disadvantaged and the marginalized, especially girls include: the abolishment of school fees; increased education budgets; social cash transfers, especially to support poor families, making it easier for them to send their children to school; increasing attention to ethnic and linguistic minorities; overcoming conflicts that keep children out of school because of hostilities; and improving the quality of education.¹⁵

School progression at the primary level

In order to achieve universal completion of primary education, it is important that all boys and girls of primary school age attend school and progress through primary education. High levels of repetition and drop out hinder a considerable number of children from transitioning to secondary education. Difficulty in progressing through the primary grades (repeating) or leaving school before completing the last grade of primary education (dropping out) occur for a variety of reasons, mostly related to the educational system and social and economic factors. Gender plays a significant role in school progression and completion in most countries.

a. Repetition

Repetition at the primary level remains relatively high in Latin America and the Caribbean, sub-Saharan Africa, Southern Asia and Western Asia

A considerable number of children experience difficulty in progressing from one grade to the next at the primary level. The percentage of repeaters at the primary level was the lowest for both boys and girls in developed regions, Eastern Asia, and the Caucasus and Central Asia.¹⁶

Box 3.3

Gender parity and equality in education—what's the difference?

Gender parity and gender equality in education mean different things. Gender parity is a purely numerical concept. Reaching gender parity in education implies that the same proportion of boys and girls would enter the education system and participate in its various cycles.

Gender equality, on the other hand, means that boys and girls would experience the same advantages or disadvantages in educational access, treatment and outcomes. In so far as it goes beyond questions of numerical balance, equality is more difficult to define and measure than parity.

The achievement of full gender equality in education would imply:

- Equality of opportunities, in the sense that girls and boys are offered the same chances to access school, i.e. parents, teachers and society at large have no gender-biased attitudes in this respect;
- Equality in the learning process, i.e. girls and boys receive the same treatment and attention, follow the same curricula, enjoy teaching methods and teaching tools free of stereotypes and gender bias, are offered academic orientation and counselling not affected by gender biases, and profit from the same quantity and quality of appropriate educational infrastructures;
- Equality of outcomes, i.e. learning achievements, length of school careers, academic qualifications and diplomas would not differ by gender;
- Equality of external results, i.e. job opportunities, the time needed to find a job after leaving full-time education, the earnings of men and women with similar qualifications and experience, etc., would all be equal.

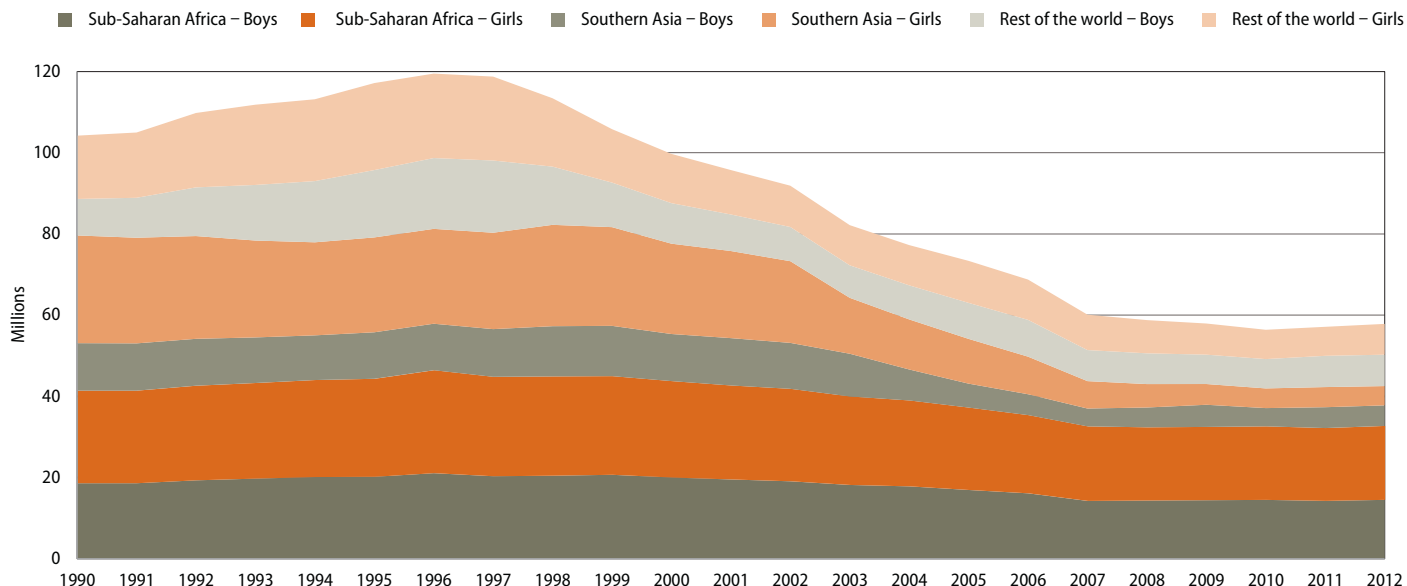
The last condition, while not strictly part of a notion of educational equality, is nevertheless affected by it: the persistence of gender discrimination in the labour market prevents the attainment of equality of access, treatment and outcomes in education by affecting the relative costs and perceived benefits of educating girls and boys. Accordingly, if full gender equality in education were to be achieved, ending labour market discrimination in all its gendered forms would probably be required.

Source: UNESCO, 2003.

¹⁵ UNESCO, 2014a.

¹⁶ Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

Figure 3.3
Number of out-of-school children of primary school age by region and sex, 1990–2012



Source: UNESCO Institute for Statistics, 2014.

Among the 46 developed countries or areas with data for the period 2005–2012, the percentage of repeaters was below 1 per cent for both boys and girls, except in Israel, Latvia, Poland, Romania and Switzerland, where the value ranged between 1 and 2 per cent for girls and/or boys, and in Andorra, Austria, Belgium, Hungary, Slovakia and Spain, where the values ranged between 2 and 4 per cent (figure 3.4). In the Caucasus and Central Asia, once enrolled in school, boys and girls rarely repeated primary grades. The case was similar in all countries of Eastern Asia, except for the Macao Special Administrative Region of China, where the repetition for boys was 6 per cent and 3 per cent for girls. Repetition in South-Eastern Asia is also relatively low, although some of the countries in the region (Cambodia, Lao People's Democratic Republic, Thailand and Timor-Leste) have recorded repetition in the range of 5 to 20 per cent. In several countries in the regions mentioned above, repetition is relatively low, in part due to the practice of automatic promotion.

Repetition at the primary level is fairly high in Latin America and the Caribbean, Northern and sub-Saharan Africa, and Southern and Western Asia.¹⁷ The phenomenon of repetition has been

¹⁷ *Ibid.*

the most persistent and its incidence the highest in sub-Saharan Africa, where the percentage of primary repeaters ranges between zero and 33 per cent in 46 countries with data. In 23 of these countries the percentage of repeaters, for both boys and girls, surpasses 10 per cent (figure 3.4). Repeaters account for about a fifth of enrolment in Burundi, Central African Republic, Chad, Comoros, Congo, Côte d'Ivoire, Madagascar, Malawi and Togo. Repetition for boys and girls is 5 per cent or higher in the Western Asia countries of Iraq, Lebanon, the Syrian Arab Republic and Yemen and in the Southern Asia countries of Bangladesh, Bhutan, India and Nepal. Out of 38 countries with data in Latin America and the Caribbean, 30 have repetition of less than 5 per cent for girls, whereas only 18 countries show such low values for boys. In most cases, repetition tends to be concentrated in the early grades and, though not exclusively, among children from poor families, those living in rural areas and among disadvantaged social groups.¹⁸ Countries that experience difficulty enrolling children in school at the official entrance age often encounter further problems in keeping them in school until they graduate from primary education.

¹⁸ UNESCO Institute for Statistics, 2012.

Girls tend to progress through primary school in a more timely manner than boys

Once they have enrolled in school, girls tend to progress in a more timely manner than boys through primary education. In 126 countries out of 190 with data for the period 2005–2012, girls repeated at a lower percentage than boys.¹⁹ The GPI was in the range of parity in 51 countries (the difference was less than 1 percentage point for boys and girls). Girls repeated at a higher percentage than boys in only 13 countries.

b. Survival to the last grade of primary school

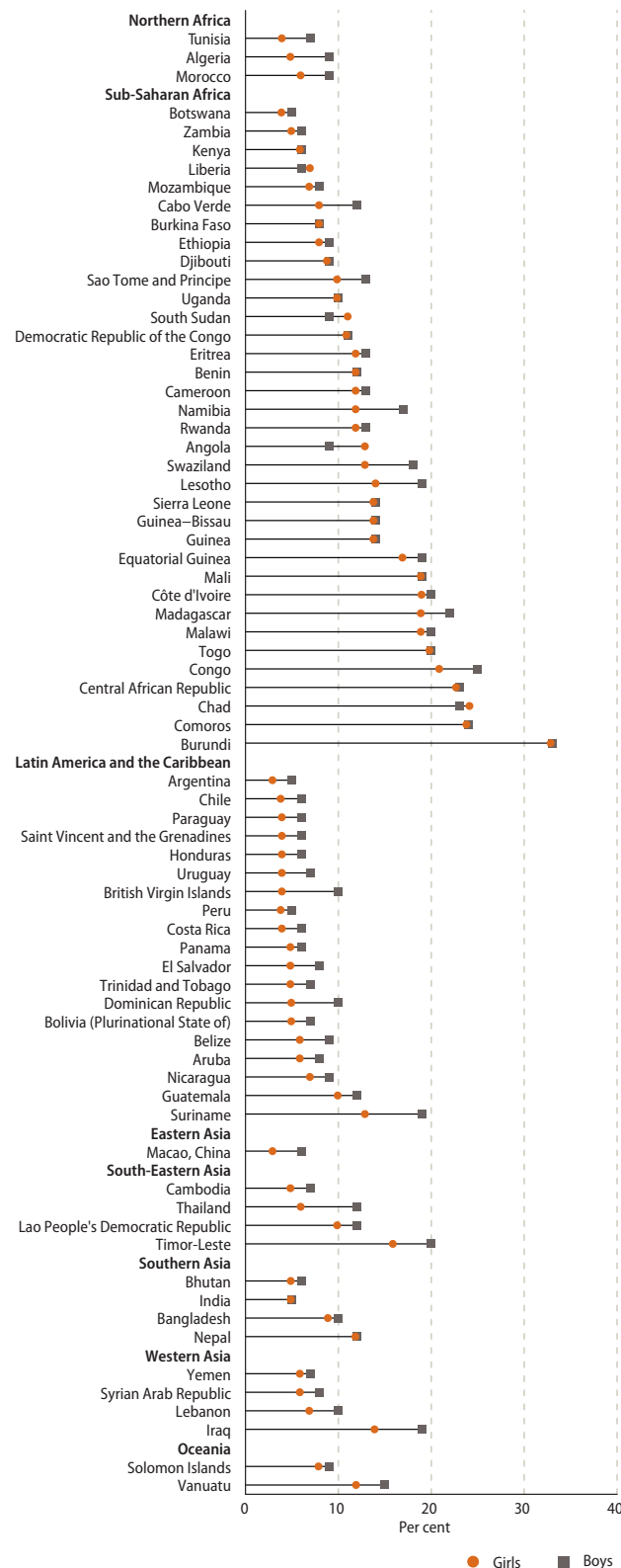
Enrolling boys and girls in school is an indispensable first step towards universal primary education, but the success in achieving that goal depends on whether they stay in school long enough to benefit from a full course of primary education. A large number of children leave school before completing primary education due to social and economic factors, including poverty, the hidden costs of schooling, civil conflict, disasters, disease, displacement, migration, language barriers and the low quality of primary education.²⁰

The survival rate up to the last grade of primary school—defined as the proportion of students starting first grade who are expected to reach the last grade regardless of repetition—is used to measure the ability and efficiency of an education system to retain students. It can also indicate the magnitude of the incidence of drop out. Survival rates approaching 100 per cent indicate a high level of retention or a low incidence of drop out.

Survival rates to the last grade of primary school show considerable variation across regions and countries

Globally in 2011, survival rates up to the last grade of primary school reached 74 per cent and 76 per cent for boys and girls, respectively (figure 3.5). Those rates were generally high, ranging from 93 to 98 per cent, in developed regions, Eastern Asia, Northern Africa, and the Caucasus and Central Asia. Survival rates of between 75 per cent and 83 per cent for boys and 78 per cent to 88 per cent for girls were recorded in Latin America and the Caribbean, South-Eastern Asia

Figure 3.4
Percentage of primary repeaters by sex and region, 2005–2012 (latest available)



¹⁹ Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

²⁰ UNESCO and UNICEF, 2012.

Source: UNESCO Institute for Statistics, 2014.

Note: Data are presented for countries where at least 5 per cent of boys or girls repeated.

and Western Asia. In contrast, between half and two thirds of pupils completed primary education in sub-Saharan Africa, Southern Asia and Oceania. Among countries with data for the period 2005–2011, the survival rates ranged from 25 per cent to 100 per cent. The survival rate for girls was less than 50 per cent in 10 countries, while it exceeded 90 per cent in 78 countries.²¹

Progress has been slow in improving survival rates at the primary school level

Between 1990 and 2011, the global survival rate at the primary school level improved by 7 percentage points for girls and 4 for boys. All regions of the world, except Oceania, improved their survival rate, but progress has been slow towards reaching the goal of universal completion (figure 3.5). Marked progress in the survival rate up to the last grade of primary education was witnessed in Eastern Asia, Latin America and the Caribbean, Northern Africa, and South-Eastern Asia, where rates improved by 14 to 22 percentage points for girls and by 12 to 15 percentage points for boys. Modest improvements in survival rates were registered in sub-Saharan Africa, Southern Asia and Western Asia. In Southern Asia, the gain for boys (4 percentage points) was much smaller than that for girls (14 percentage points). Oceania is the only region that made no progress at all and even fell back in this indicator.

c. Transition from primary to secondary education

A successful outcome of primary education is an increase in enrolment at the secondary level. The transition rate from primary to secondary education is based on the number of new entrants to the first grade of secondary education (general programmes only) in a given year, expressed as a percentage of the number of students enrolled in the final grade of primary education in the previous year who do not repeat the last grade of primary in the following year.

Globally, most students who reach the end of primary education continue their studies

Worldwide, more than 91 per cent of primary school students transitioned to lower secondary school in 2012²² (figure 3.6). High rates of transition from primary to lower secondary education are observed in most countries, indicating that the end of primary education is not the most common exit point from the education system. In developed regions, all countries, except Bosnia and Herzegovina (with transition rates of 83 per cent for girls and 85 per cent for boys), reported transition rates above 95 per cent for both girls and boys. Transition rates were above 95 per cent also in Eastern Asia, Latin America and the Caribbean, and the Caucasus and Central Asia, and between 85 and 95 per cent in Northern Africa, South-Eastern Asia, Southern Asia and Western Asia. Some of the lowest transition rates were found in sub-Saharan Africa, where only 77 per cent of girls and 79 per cent of boys moved on to secondary education. Slightly over a third of the countries in the region recorded rates over 90 per cent, while about another third of countries registered rates below 75 per cent. In three countries in this latter group (Angola, Guinea and the United Republic of Tanzania), the rate was less than 50 per cent for girls and/or boys.

The transition to secondary education has improved for developing regions as a whole during the past decade

The transition to general secondary education improved for developing regions as a whole from 1990 to 2011, by 13 percentage points for girls and 9 points for boys. Progress in the transition rate from primary to secondary school was substantial in Eastern Asia, South-Eastern Asia, Southern Asia and Western Asia, especially for girls. The Caucasus and Central Asia and Latin America and the Caribbean have moved to near universal transition (98 per cent or higher) from the primary to secondary level. Progress in Northern Africa was relatively modest.

Currently, the GPI of transition rates to secondary education shows parity across all regions of the world and in most countries. In 106 out of the

²¹ Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

²² The indicator is referenced to the earlier year as it is a percentage of the previous year's cohort but the transition actually takes place in the later year.

154 countries with data for the period 2005–2011, girls and boys who reached the end of primary education continued their studies at the lower secondary level at more or less the same rate.²³

3. Secondary education

While successful completion of primary education provides the foundation for a lifetime of learning, secondary education is the key to acquiring more complex skills and knowledge, which in turn offer individuals more opportunities in life, including preparation for tertiary education and better jobs.

Participation in secondary education

Secondary enrolment ratios for both boys and girls have increased since 1990 but remain lower than the corresponding ratios at the primary level

Participation in secondary education²⁴ has expanded steadily in all regions of the world (figure 3.7). Globally, the secondary GER improved by 26 percentage points for girls and 20 percentage points for boys over the period 1990–2012. Despite this remarkable improvement, only 72 per cent of the world's girls and 74 per cent of boys attended secondary school in 2012. The global enrolment ratios in secondary education for both boys and girls were lower than the corresponding ratios in primary education.²⁵ In addition, when compared to those at the primary level, secondary enrolment ratios show significant variation among regions. It was close to 100 per cent for both boys and girls in developed regions and the Caucasus and Central Asia, and was close to 90 per cent in Eastern Asia, Latin America and the Caribbean, and Northern Africa. Despite the steady expansion of post-primary education, secondary enrolment was low in many developing countries. In sub-Saharan Africa, the secondary enrolment ratio was 45 per cent for boys and 38 per cent for girls. Similarly, in Oceania, it was 52 per cent for boys and 45 per cent for girls. Secondary GERs were close to or

²³ Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

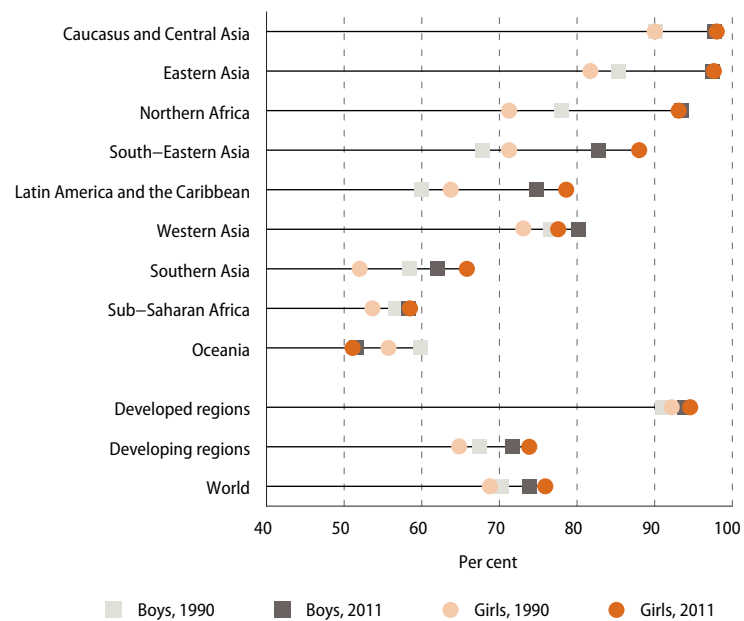
²⁴ Secondary education comprises lower secondary (ISCED 2), upper secondary (ISCED 3) or postsecondary non-tertiary (ISCED 4).

²⁵ This is so partly because in some countries primary education is compulsory and freely provided by the State, while secondary education is not, especially in developing countries.

lower than 75 per cent for both boys and girls in the other regions, namely South-Eastern, Southern and Western Asia.

Figure 3.5

Survival rates to last grade of primary school by sex and region, 1990 and 2011

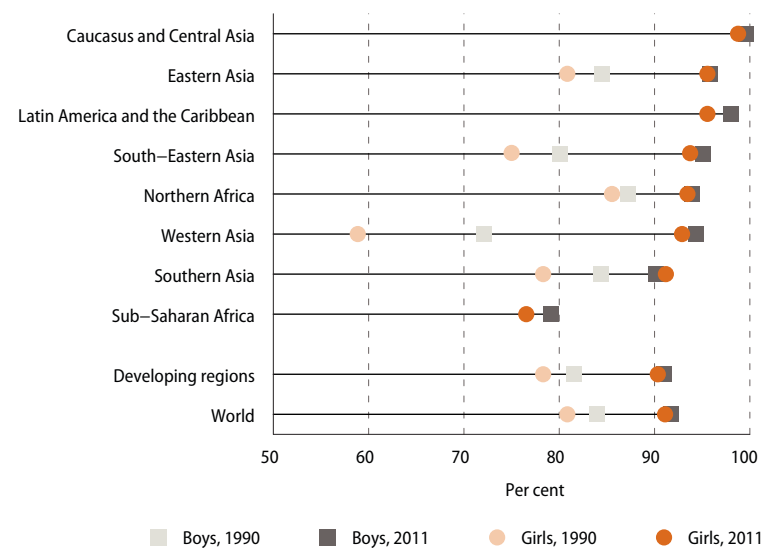


Source: UNESCO Institute for Statistics, 2014.

Note: Regions are listed in descending order of the survival rate for girls in 2011.

Figure 3.6

Transition rates from primary to secondary education by sex and region, 1990 and 2011



Source: UNESCO Institute for Statistics, 2014.

Note: Regions are listed in descending order of the transition rate for girls in 2011.

Despite progress in reducing gender disparities in secondary enrolment, girls still face significant disadvantages in many regions

Between 1990 and 2000, the gender gap between the global GERs for boys and girls declined from 9 to 5 percentage points (figure 3.7). The decline continued steadily through 2012, shrinking to only 2 percentage points. Despite the gains made over the past two decades, girls are still less likely than boys to enrol in secondary school in Oceania, sub-Saharan Africa, and Southern and Western Asia—all regions with low overall enrolment rates for both boys and girls. In regions with higher overall secondary enrolment ratios—such as Eastern Asia and Latin America and the Caribbean—gender-based disparities favour girls. Developed regions and the Caucasus and Central Asia are the only regions that have achieved and maintained equal access to secondary education for both boys and girls throughout the period 1990–2012.

The number of countries reporting gender parity at the secondary level was lower than that at the primary level in most regions

Although gender disparities in access to secondary education have been reduced, they remain more prevalent and wider than those at the primary level (figure 3.8). In those countries where girls are severely disadvantaged, gender differences at the secondary level are partly a reflection of cumulative gender disparities at the primary level and those at the transition to the secondary level.²⁶ A small number of countries are near gender parity in secondary education than in primary education. Out of 184 countries with data for the period 2005–2012, gender parity has been attained in only 62 countries, in contrast to 113 countries at the primary level. Gender disparities in secondary education favouring girls over boys have been observed in 58 countries with data. On the other hand, gender disparities favouring boys were found in 64 countries with data. In 36 countries, the GPI was less than 0.90.²⁷

²⁶ UNESCO Institute for Statistics, 2005.

²⁷ Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

Out-of-school adolescents of lower secondary school age

A large number of young adolescents of lower secondary school age²⁸ are out of school.²⁹ In 2012, 62 million, or one in five adolescents of lower secondary school age, were out of school worldwide.³⁰ The problem is most widespread in sub-Saharan Africa and Southern Asia, which together account for more than three quarters (77 per cent) of all out-of-school adolescents in this age group. Many out-of-school adolescents are likely to face the prospect of social and economic marginalization.³¹ Out-of-school adolescent girls face additional challenges, including early marriage and pregnancy and the burden of domestic responsibilities.

Girls make up half of the global out-of-school adolescent population of lower secondary age

Globally in 2012, girls made up 50 per cent of out-of-school adolescents of lower secondary age, compared to 53 per cent in 1999. Substantial variations are found among and within regions. In Western Asia, girls accounted for 60 per cent of all out-of-school adolescents of lower secondary school age. In sub-Saharan Africa and the Caucasus and Central Asia, the share of girls in the out-of-school adolescent population was well over half. Girls made up slightly less than half of the out-of-school adolescents in the other regions.

Progress at the global level has been notable since 1999, especially for girls. During the period 1999–2012, the global rate of out of school adolescent girls declined from 28 to 17 per cent, while that for boys dropped from 23 to 16 per cent.³² Less than 10 per cent of adolescent girls and boys of lower secondary age were out of school in the developed regions, Eastern Asia, Latin America and the Caribbean and the Caucasus and Central Asia. The out of school rates were much higher in sub-Saharan Africa (36 per cent of adolescent girls and 31 per cent of adolescent boys) and in

²⁸ Usually between 12 and 15 years old.

²⁹ Typically, young adolescents are not enrolled in lower secondary school either because they have not completed primary school or could not make the transition to lower secondary school.

³⁰ Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

³¹ UNESCO, 2010.

³² Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

Southern Asia (26 per cent of boys and girls). Among countries with available data, the rate was higher than 20 per cent for girls and/or boys in 36 countries. The difference between the rate for girls and that for boys was larger than 15 percentage points in Angola, Antigua and Barbuda, Bangladesh, Central African Republic, Ethiopia, Guinea, Iraq, Mali, Swaziland, Togo and Yemen.³³

Graduation from lower secondary education

Completion ratios for lower secondary education are inadequate in several countries

The gross graduation ratios³⁴ for lower secondary education exceeded 80 per cent for both girls and boys in almost all countries with available data for 2012 (or latest available year since 2005) in developed regions, Eastern Asia and the Caucasus and Central Asia. Similarly, completion of lower secondary education was relatively high in Latin America and the Caribbean and Western Asia, where several countries reported graduation ratios close to or above 80 per cent. On the other hand, in sub-Saharan Africa, graduation ratios were lower than 40 per cent in nearly three quarters of countries with available data (figure 3.9).

Girls completed lower secondary education at a higher ratio than boys in the majority of countries with data

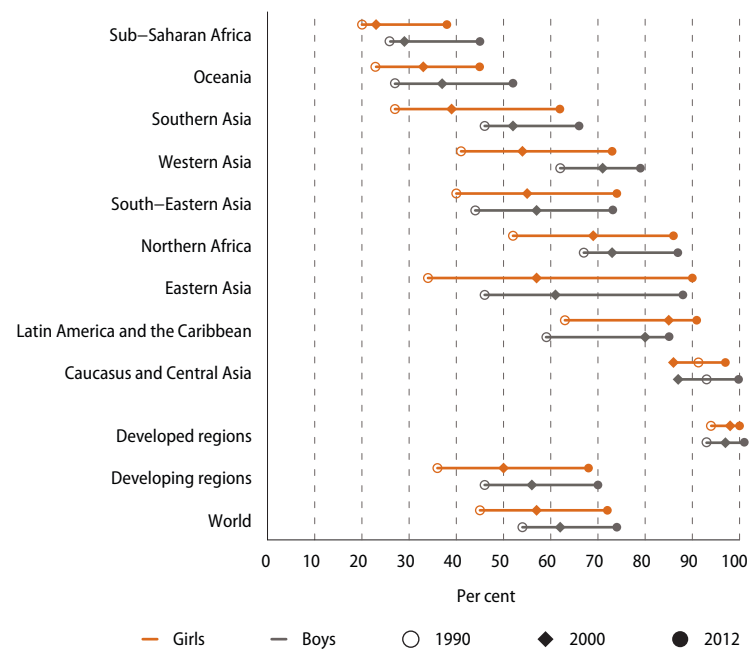
Girls completed lower secondary education at a higher ratio than boys in more than half of the countries with available data (figure 3.9), despite being more disadvantaged in participation at the secondary level in many developing regions. Out of 101 countries reporting data, girls graduated at a higher ratio than boys in 57 countries. In Latin America and the Caribbean, this was the case in 24 out of 29 countries and areas with available data. The exceptions were Anguilla, the Bahamas, the British Virgin Islands, Cuba and Saint Lucia, where boys outperformed girls. Girls completed lower secondary education at a higher ratio than boys in Northern Africa, Oceania, Southern Asia (except Afghanistan and Pakistan) and Western

³³ *Ibid.*

³⁴ The gross graduation ratio for lower secondary education is the number of graduates of lower secondary education, regardless of age, expressed as a percentage of the population at the theoretical graduation age for this level. The ratio can exceed 100 per cent because the number of graduates in the calculation includes children who are over-aged and under-aged relative to the theoretical graduation age.

Asia (except Yemen). However, the reverse was observed in 22 of the 28 countries reporting data by sex in sub-Saharan Africa. The exceptions were Botswana, Cabo Verde, Mauritius, Seychelles, South Africa and Swaziland, where girls graduated at a higher ratio than boys. Gender differences were minor (less than 5 percentage points) or at parity in developed regions and Eastern Asia. A similar situation prevailed in South-Eastern Asia (except in the Philippines, where

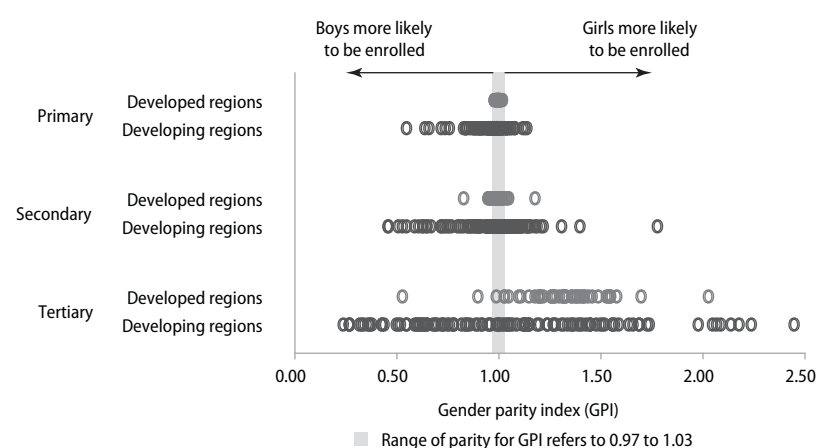
Figure 3.7
Secondary gross enrolment ratios by sex and region, 1990, 2000 and 2012



Source: UNESCO Institute for Statistics, 2014.

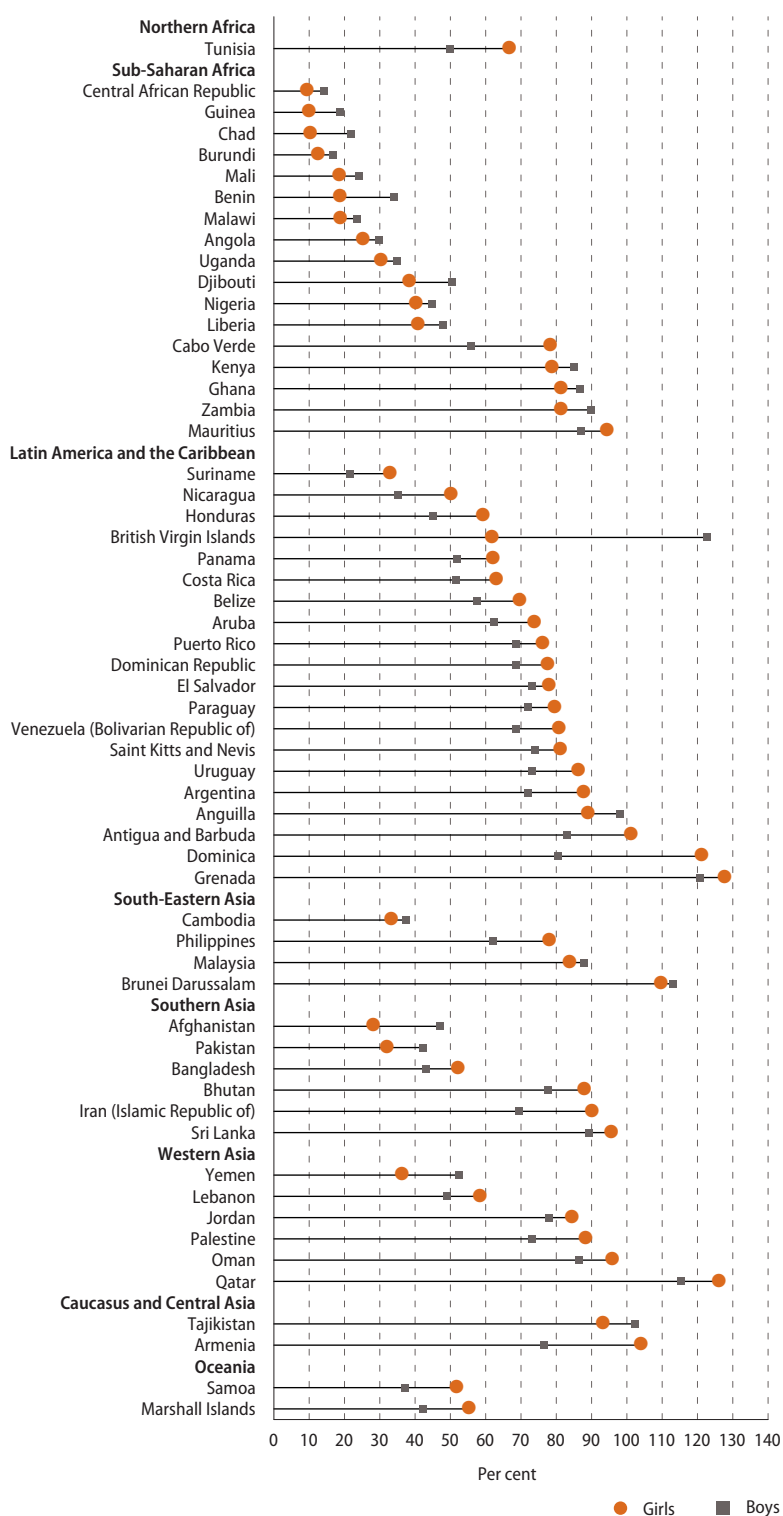
Note: Regions are listed in ascending order of the secondary gross enrolment ratio for girls in 2012.

Figure 3.8
Gender parity index (GPI) for gross enrolment ratios in primary, secondary and tertiary education, 2005–2012 (latest available)



Source: UNESCO Institute for Statistics, 2014.

Figure 3.9
Gross graduation ratios for the lower secondary level by sex and region, selected countries, 2005–2012 (latest available)



Source: UNESCO Institute for Statistics, 2014.

Note: Data are presented for countries where the difference between the gross graduation ratios for girls and boys is at least 5 percentage points. The ratio can exceed 100 per cent because the number of graduates in the calculation includes children who are over-aged and under-aged relative to the theoretical graduation age.

girls graduated at a ratio of 15 percentage points higher than that for boys) and the Caucasus and Central Asia (except in Armenia where the ratio was in favour of girls by 26 percentage points, and in Tajikistan, where it was to the advantage of boys by 10 percentage points).

Participation in technical and vocational education and training

Technical and vocational education and training (TVET) programmes develop skills and competencies valued by employers and/or are useful for self-employment. Such programmes equip young women and men with capabilities that can broaden their opportunities in life and prepare them for the transition from school to work. TVET encompasses a wide range of fields—from teacher training programmes to commercial studies and to various technical fields in industry and engineering.

More boys than girls participate in TVET in all regions except Latin America and the Caribbean

Between 1990 and 2012, the global share of girls enrolled in TVET programmes at the secondary level remained unchanged at 44 per cent (figure 3.10). This proportion has fallen slightly—from 45 to 43 per cent—in developed regions. Among developing regions, the share of girls enrolled in TVET has declined slightly in Latin America and the Caribbean, Oceania and South-Eastern Asia. The share has increased, however, in Eastern Asia, sub-Saharan Africa, and Southern and Western Asia.

Of the 163 countries for which data were available for the period 2005–2012, girls had lower TVET enrolment than boys in 140 countries.³⁵ In 34 of those countries, young women were considerably underrepresented, at only one third of enrolment or less. In several Southern Asian countries, including Afghanistan, Bangladesh, Bhutan, India and Nepal, the share of girls was between 12 and 33 per cent. In Western Asia, the share of girls enrolled in such programmes was between 5 and 19 per cent in Bahrain, Iraq, Kuwait, Saudi Arabia, United Arab Emirates, Yemen and the State of Palestine. Similarly, in sub-Saharan Africa, the majority of countries showed lower

³⁵ Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

enrolments among girls than boys. In Angola, Comoros, Madagascar, Sao Tome and Principe, Sudan and Tunisia, girls' shares were only a third or less. However, in six countries in the region (Ethiopia, Kenya, Lesotho, Liberia, Niger and Senegal), girls represented half or over half of TVET enrolment. More girls were enrolled than

boys in 16 of the 163 countries with data. Most of those countries were located in Latin America and the Caribbean, including Brazil, Colombia, Costa Rica, Dominica, Dominican Republic, El Salvador, Guatemala, Mexico, Nicaragua and the Bolivarian Republic of Venezuela.³⁶

Box 3.4

Learning achievement of girls and boys

The main purpose of any education system is to impart skills to young people so that they can effectively participate in the social, economic and political life. Getting children into school is not an end in itself. The ultimate measure of success is not only the extent to which children learn, but the quality of their education experience. Student assessment surveys provide a measure for assessing learning outcomes and the quality of education. Such surveys allow some assessment to be made of the relative achievements of girls and boys in terms of the subjects they study in school. The Organisation for Economic Co-operation and Development (OECD) Programme for International Student Assessment (PISA)—which surveys school performance among 15-year-olds around the world, particularly in reading, mathematics and science—makes it possible to measure disparities among and within countries in terms of the skills students attain after a given period of learning. Typically, this is done after about eight years of schooling, near the end of compulsory education in many countries.

Results from a PISA survey^a conducted in 2012 in 34 OECD member States and 31 other countries and areas showed large gaps in learning achievement among countries. In general, low-income countries lag far behind high-income countries in learning achievement. Also, there is less variation among OECD countries than among non-OECD countries. Furthermore, differences among countries represent only a fraction of the overall variation in student performance. In all three subjects tested—reading, mathematics and science—the differences between the lowest- and the highest-performing students within the countries were large and the inequality in learning achievement across population groups was closely related to wealth distribution. Gender differences in educational performance were considerably less prominent than differences between the countries and within countries in educational performance.^b Nevertheless, existing gaps underscore the importance of a gender-sensitive approach in teaching.

Girls outperformed boys in reading skills in every country that participated in the 2012 PISA survey

Results from the PISA 2012 reading assessment showed that girls outperformed boys in every participating country. The OECD average score for reading performance was 478 points for boys and 515 for girls (a gender gap of 38 score points, which is roughly equivalent to one year of schooling). Similarly, the non-OECD average showed a gap of 41 points to the advantage of girls. Gender gaps in students' performance were related to gender differences in attitudes towards reading. Fifteen-year-old girls were more likely to read for enjoyment and read complex works of fiction and non-fiction, whereas boys were more likely to read comic books, which could partly be the result of their weaker reading skills. Girls also tended to be more skilled in understanding, remembering and summarizing the material they read.^c

Boys did slightly better than girls in mathematics in most countries

Performance in mathematics was also characterized by gender differences, which tended to be smaller and less systematic than those related to reading. Boys performed better in mathematics than girls in the majority of countries that participated in the PISA survey (52 out of 65 countries or areas). The average OECD score in mathematics was 499 for boys and 489 for girls (a 10-point gender gap), while for non-OECD countries or areas, the average score was 453 for boys versus 448 for girls (a 5-point gap). In contrast to what was observed for reading, the gender gaps were not significant in many countries. In 13 countries, the gender disparities were actually in the favour of girls, albeit the size of the gaps being small. Girls appear to be narrowing the gaps in achievement in mathematics where boys have historically held an advantage. Gender differences in science performance showed much narrower gaps than in mathematics and reading for most countries or areas—both OECD and non-OECD—and in most cases the gaps were not statistically significant.^d

^a OECD, 2014.

^b *Ibid.*

^c *Ibid.*

^d *Ibid.*

4. Tertiary education

Tertiary education builds on secondary education and imparts knowledge and skills as well as qualifications in specialized fields. It also brings extensive social and private benefits. At the individual level, pursuing and completing a tertiary education are linked to better employment opportunities and higher levels of earning (see, for example, Chapter 4 on Work). At the societal level, tertiary education graduates contribute to human capital, which is essential for economic development, productivity growth, innovation and the healthy functioning of government and civil society.³⁷

Participation in tertiary education

Tertiary enrolment of women and men globally has seen substantial growth over the past two decades

Globally, participation in tertiary education showed remarkable progress between 1990 and 2012, reflecting the steady expansion of education systems around the world and the increasing demand for a highly skilled labour force. Over that period, participation, as measured by

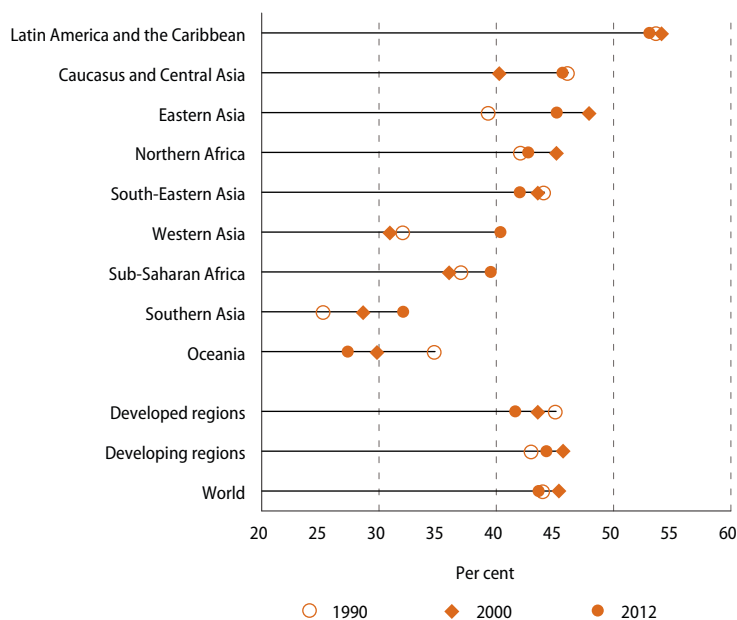
the tertiary GER,³⁸ rose from 13 to 33 per cent for women, and from 14 to 31 per cent for men (figure 3.11). Substantial progress was observed across the world, with developing countries as a whole registering a threefold increase for men and a fourfold increase for women.

Participation in tertiary education shows large regional disparities

Despite considerable expansion of tertiary education across the board, tertiary GERs show large regional disparities. Gross enrolment ratios are high for both women and men in regions where tertiary education participation has historically been high. Developed regions, Latin America and the Caribbean, and Western Asia remain the global leaders. Developed regions expanded tertiary enrolment from 42 to 66 per cent for men and from 46 to 85 per cent for women. In Latin America and the Caribbean, the tertiary GER more than doubled for men and almost tripled for women. In terms of progress since 1990, Eastern Asia enjoyed a nearly fivefold increase for men and a tenfold gain for women. Growth in tertiary enrolment in this region has been especially remarkable since the year 2000. Similarly, Western Asia saw nearly a tripling of growth for men and almost a quadruple rise for women.

In contrast, despite significant progress, tertiary GERs for women and men remain low in other regions. In sub-Saharan Africa, it only rose from 4 to 10 per cent for men and from 2 to 6 per cent for women over the period 1990-2012. Similarly, in Southern Asia, GERs are lower than global averages at 25 per cent for men and 20 per cent for women. When India is excluded from the averages, these ratios drop to 19 per cent for men and 17 per cent for women. Between 1990 and 2012, the Caucasus and Central Asia was the only region in the world to experience stagnation in tertiary participation in the mid- to low-20 per cent range for both men and women.

Figure 3.10
Share of girls participating in TVET at the secondary level, 1990, 2000 and 2012



Source: UNESCO Institute for Statistics, 2014.

Note: Regions are listed in descending order of the share of girls in 2012.

³⁷ UNESCO Institute for Statistics.

³⁸ The gross enrolment ratio in tertiary education is computed as the total enrolment in tertiary education, regardless of age, expressed as a percentage of a target population group consisting of the five-year age group following secondary school leaving. There are limitations when comparing the actual population coverage across countries due to the diversity in the duration of tertiary programmes, the enrolment of large numbers of women and men outside the target age group, and the high levels of drop outs and frequent re-enrolments.

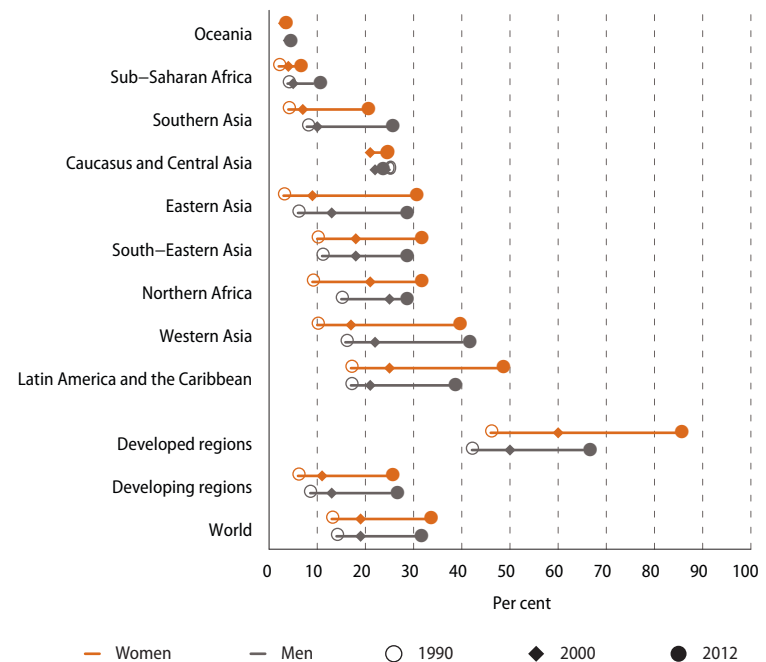
Enrolment in tertiary education is increasing faster for women and exceeding that of men in most regions, but in sub-Saharan Africa and Southern Asia women remain at a serious disadvantage

Changing patterns of participation in tertiary education between 1990 and 2012 have shifted gender disparity from a male to female advantage in the world and in most regions (figure 3.11). In 1990, men's participation was higher than that of women as reflected in a worldwide GPI of 0.90.³⁹ Since then, the global participation of women has increased at a faster rate than that of men, enabling the tertiary enrolment ratios of men and women to reach parity around the year 2000. Subsequently, the global participation of women exceeded that of men, shifting gender disparity from a male to female advantage. In 2012, the GPI of the global tertiary enrolment of women and men stood at 1.08, reflecting a gender disparity highly favouring women.⁴⁰

In most regions of the world, women outnumber men in tertiary education. In 2012, the GPI surpassed the parity range in developed regions (GPI of 1.28), Northern Africa (1.22), Latin America and the Caribbean (1.28), Eastern Asia (1.08), South-Eastern Asia (1.12) and the Caucasus and Central Asia (1.07). However, considerable disparity in favour of men persists in sub-Saharan Africa and Southern Asia (GPI of 0.64 and 0.81, respectively). Overall, there are almost as many women as men enrolled in tertiary education in the Western Asia, but the regional average conceals very low participation among women in several countries. For instance, the GPI was 0.44 for Yemen and 0.60 for Iraq.⁴¹

Out of 168 countries with available data for the period 2005–2012, only six countries showed gender parity at the tertiary level. In 106 countries, disparities were in favour of women, while in the other 56 countries they favoured men. Women outnumber men in tertiary enrolment in almost all countries in developed regions, but only in half of the countries in developing regions (see figure 3.8). For instance, women's participation in tertiary education was less than half that of men's (GPI of less than 0.50) in several countries with low tertiary enrolment in sub-Saharan Africa and Western Asia, including Benin, Chad, Eritrea,

Figure 3.11
Tertiary gross enrolment ratios by sex and region, 1990, 2000 and 2012



Source: UNESCO Institute for Statistics, 2014.

Note: Regions are listed in ascending order of the tertiary gross enrolment ratio for women in 2012.

Ethiopia, Guinea, Mauritania, Niger and Yemen.⁴² It is important to consider gender equality in the context of the overall level of participation in tertiary education. Where tertiary GERs remain low, countries must address gender inequalities as they seek to broaden access to tertiary education for all students, women and men alike.

Tertiary graduates by field of study

The field of study that men and women choose has an impact on their future lives, careers, incomes and roles in society. Many factors drive students' subject preferences in tertiary education, including performance in secondary education, perception of one's own abilities, social, economic and family background, career aspirations and labour market expectations. Gender-based stereotypes and gender differences in the balance between job and family responsibilities are also a significant factor.

Figure 3.12 presents data on the proportion of women and men graduates in eight broad fields of study: education; health and welfare; humanities and arts; social science, business and law; science; engineering, manufacturing and con-

³⁹ Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

⁴⁰ *Ibid.*

⁴¹ *Ibid.*

⁴² *Ibid.*

struction; agriculture; and services. The figure illustrates that women and men choose very different fields of study in tertiary education. This observation holds across many developing and developed countries.

Women are more likely to graduate in fields related to education, health and welfare, and humanities and arts

Fields of study traditionally dominated by women—education, health and welfare, and humanities and arts—continue to be more often preferred by women than by men (figure 3.12). Women are particularly prominent in education and in health and welfare. Women were at least twice as likely to graduate in education as men in three quarters of the 111 countries reporting data by field of study for the period 2005–2012. In the case of health and welfare programmes, women were at least twice as likely to graduate in that field as men in four out of five countries. Among women graduates, on average, one out of six graduated in the field of education compared to one out of 10 men graduates; and one in seven women graduated in health and welfare, compared to one in 15 men.

Women are less likely than men to graduate in fields related to science and engineering

Despite enjoying better access to tertiary education than ever before, women continue to face challenges in participating in some fields of study traditionally dominated by men. Women are less likely than men to graduate in science, engineering, manufacturing, construction, agriculture, and services. This is particularly so in the case of engineering and to a lesser extent science among countries with data for the period 2005–2012 (figure 3.12). Among men graduates, on average, one in five graduated in engineering compared to one out of 20 women graduates, and one in nine men graduated in science compared to one in 14 women. In all countries with data, with the exception of Cyprus (where 16 per cent of men and 11 per cent of women graduated in engineering) and Myanmar (4 per cent of men and women), men were at least twice as likely to graduate in engineering as women. In a third of these countries, representing different regions, the percentage of men graduating in this field was at least 5 times higher than that of women. As for the field of science, in 6 out of 10 countries with data, the percentage of men graduating in this field was at least twice that of women.

B. Women in research and development

Researchers are professionals engaged in the conception or creation of new knowledge, products, processes, methods and systems, as well as the management of these projects. Innovation is an acknowledged determinant of economic growth.⁴³ Since research and development is one of the key components of innovation, it is important to assess the gender-balance in the research workforce. Despite improved access to tertiary education, women still face considerable barriers as they transition from higher education to careers in research. As a result, women continue to be underrepresented in research and development. This limits their ability to contribute to innovation on an equal basis with men. It also affects the overall quality of research given the different perspectives women bring to any project.⁴⁴

1. Participation in research

Less than a third of world's researchers are women

In 2011, women constituted 30 per cent of all researchers worldwide (figure 3.13). This figure has remained almost constant over the past decade, highlighting the lack of progress towards gender parity in this area. Developed regions (30 per cent) and developing regions (31 per cent) are similar in terms of the average shares of women researchers. Only one region—the Caucasus and Central Asia (45 per cent)—has achieved gender parity, defined here as a share of between 45 and 55 per cent (inclusive) for each sex. Latin America and the Caribbean (44 per cent), South-Eastern Asia (43 per cent) and Northern Africa (40 per cent) follow closely. By comparison, the share of women researchers is lowest in Eastern Asia (18 per cent) and Southern Asia (20 per cent).

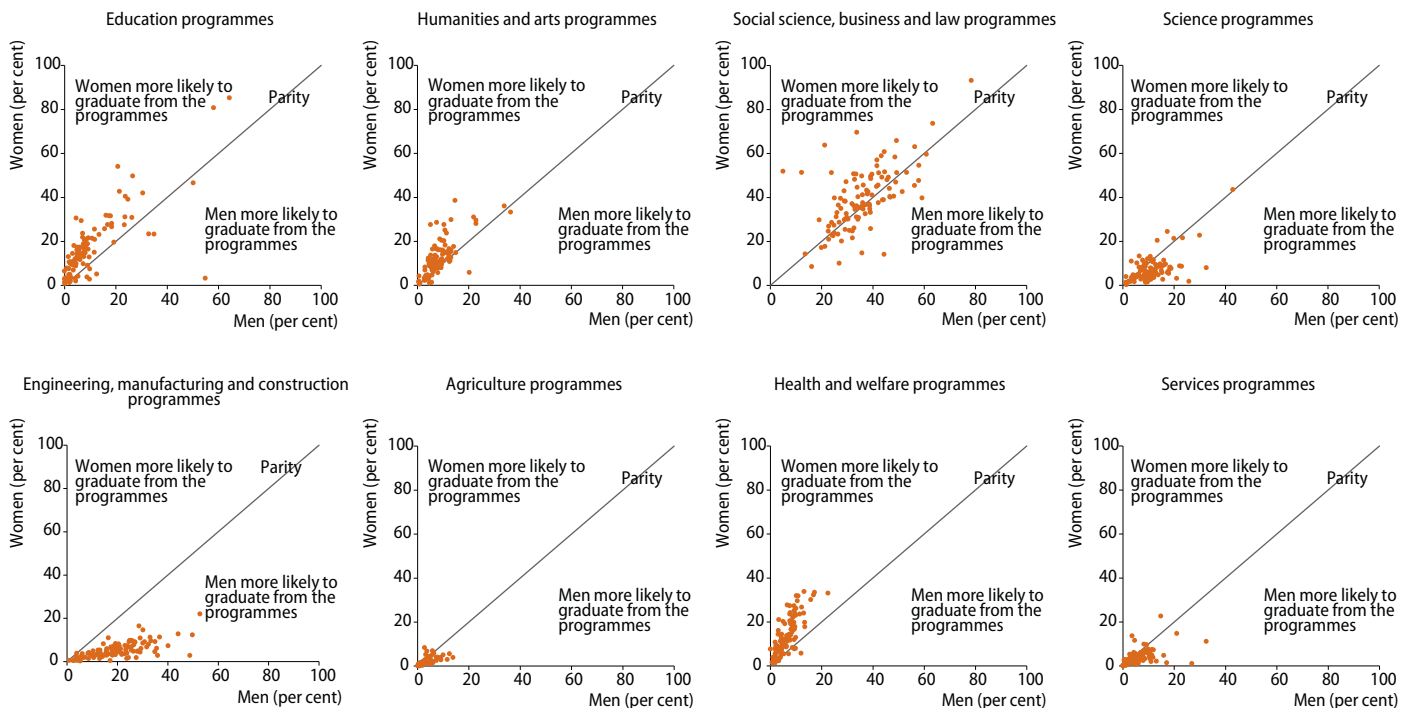
Women accounted for less than half of researchers in 108 out of 120 countries with available data⁴⁵ in the period 2005–2012. In 53 countries, women's share is less than a third. This is the case in 19 out of 30 countries with available data in sub-Saharan Africa.

⁴³ UNESCO Institute for Statistics, 2014a.

⁴⁴ European Commission, 2013.

⁴⁵ Data based on UNESCO Institute for Statistics, 2014b. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

Figure 3.12
Proportion of tertiary graduates by field of study, women and men, 2005–2012 (latest available)



Source: UNESCO Institute for Statistics, 2015. UIS Data Centre. <http://www.uis.unesco.org> (accessed in February 2015).

Note: Each point represents data for one country. Data correspond to reference year 2012 or latest available in the period 2005–2012. The diagonal line is a gender parity line for the respective field of study. Below the gender parity line, more men than women are shown to graduate in the respective field of study. Above the line, more women than men are shown to graduate in that field of study.

2. Field of research

The current gender distribution of researchers in the various fields of science is the cumulative result of variations in graduation from tertiary education, particularly at the highest level required for a research career, and in the labour market. Figure 3.14 presents the share of women among researchers by region in six specific fields of science: natural sciences; engineering and technology; medical sciences; agricultural sciences; social sciences; and humanities.

Men dominate in all fields of research globally

At the global level, gender disparities reflect the advantage men have in participation in all the six areas of research. Most regions display the same pattern of male domination, with the exception of South-Eastern Asia, which has registered parity in participation across all six research fields.

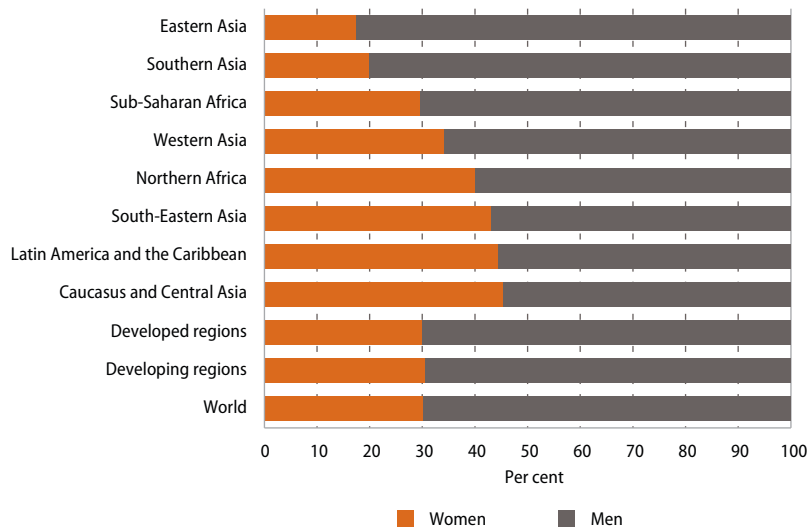
In two fields—medical sciences and humanities—the global share of women is relatively higher (42 per cent and 44 per cent, respectively)

and comes close to parity.⁴⁶ Several regions display parity for these two fields. For instance, four regions—Latin America and the Caribbean, Northern Africa, South-Eastern Asia and Western Asia—show parity in medical sciences. In the Caucasus and Central Asia, women are actually at an advantage in this field. In addition, more than one third of the 67 countries or areas with available data in the field of humanities in the period 2005–2012 reported gender parity. In 10 countries or areas, women represented over 55 per cent of the total researchers in the humanities, whereas their share was lower than a third in 21 countries or areas.

Globally, women's participation is the lowest in engineering and technology (17 per cent). Only South-Eastern Asia achieved parity (45 per cent) in this field, while in the remaining regions, the overwhelming majority of researchers in this field are men. Only four countries—Azerbaijan, Guatemala, Malaysia and Mongolia—out of 74

⁴⁶ Here gender parity is defined as a share of between 45 and 55 per cent (inclusive) for each sex.

Figure 3.13
Women's and men's share of the total number of researchers by region, 2011



Source: UNESCO Institute for Statistics, 2014.

Note: Data on researchers are based on the total number of persons who are mainly or partially employed in research and development. This includes staff employed both full-time and part-time. Regions are listed in ascending order of women's share in 2011.

with available data for this field recorded parity in the period 2005–2012.⁴⁷ In 55 countries, men outnumbered women researchers by more than two to one. Much remains to be done to increase women's participation in research and to strengthen their influence in the science and technology agenda.

C. Women in teaching

Teachers represent a key educational resource. Trained, qualified and well-motivated teachers are fundamental for an effective learning environment and better quality in education. The teaching staff has an important role in the creation of a gender-sensitive learning and social environment in which girls and boys are treated equally and encouraged to achieve their full potential. Policies that promote gender balance in teaching workforces have been found to have a positive impact on access to education and completion rates, especially for girls and young women.⁴⁸ The mere presence of female teachers is, however, insufficient to ensure that girls enrol and complete schooling. In this regard, training teachers to be gender sensitive is crucial.

⁴⁷ Data based on UNESCO Institute for Statistics, 2014b. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

⁴⁸ UNESCO Institute for Statistics, 2010.

Teaching at the primary level is dominated by women

The participation of women in the teaching profession has increased over the period 1990–2012 at all levels of education in most regions (figure 3.15). Women accounted for about two thirds of primary school teachers worldwide in 2012, up from 56 per cent two decades ago. They constitute the majority of primary school teachers in most regions of the world, although the data show significant variations across countries. In the developed regions as a whole, women teachers accounted for 84 per cent of the primary teaching staff in 2012 compared to 58 per cent in developing regions. The share was highest in the Caucasus and Central Asia at 89 per cent and lowest in sub-Saharan Africa at 44 per cent.

In 82 countries out of 164 reporting data for the period 2005–2012, the proportion of female primary school teachers exceeded 75 per cent.⁴⁹ The proportion exceeded 90 per cent in 22 countries, while in 15 countries it was less than 30 per cent. All but one of these countries was in sub-Saharan Africa. The proportion of women primary teaching staff is lower in countries with low levels of overall enrolment.

Women's share in teaching staff declines at successive levels of education

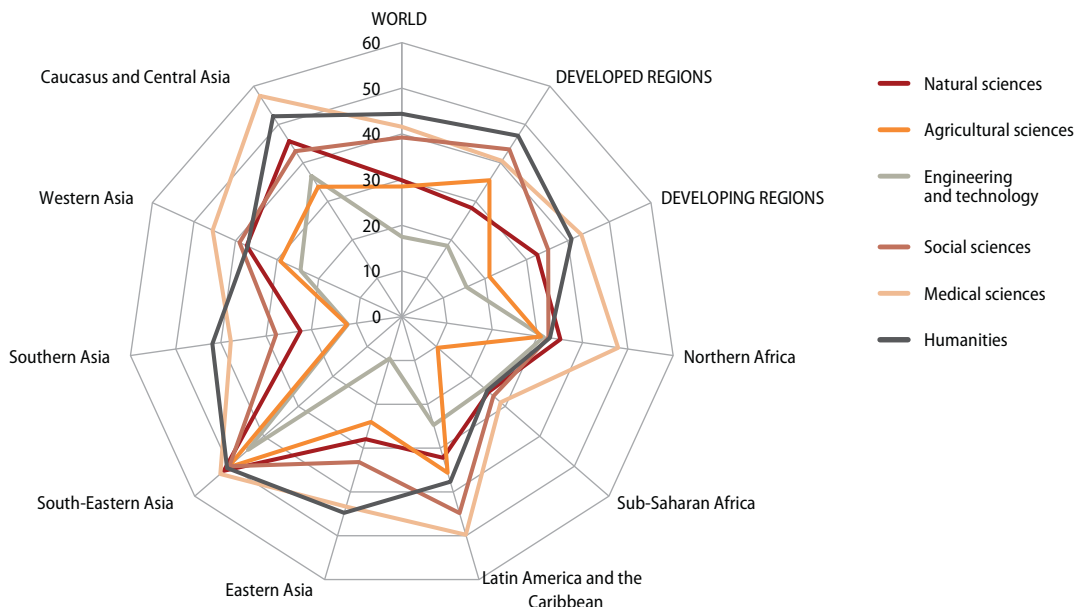
The share of women teachers is lower at the post-primary levels of education. Globally, 52 per cent of teachers at the secondary school level were women in 2012, up from 48 per cent in 1990. The proportion for developing regions as a whole was 48 per cent, and 63 per cent for developed regions. Regionally, the proportion ranged from 69 per cent in the Caucasus and Central Asia to 31 per cent in sub-Saharan Africa. Women teachers throughout sub-Saharan Africa are vastly outnumbered by men. In 16 countries in the region, the proportion of female teachers at the secondary level was below 20 per cent. Similarly, in the majority of Southern Asia countries, including Afghanistan, Bangladesh, Bhutan, India and Nepal, women's share was below half.⁵⁰

At the tertiary level, most teaching staff in the world are men. Women represented 42 per cent

⁴⁹ Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

⁵⁰ *Ibid.*

Figure 3.14
Share of women among researchers by region and field of science, 2011



Source: UNESCO Institute for Statistics, 2014b.

Note: Statistics on researchers are based on the total number of persons who are mainly or partially employed in research and development. This includes staff employed both full-time and part-time.

of teachers at this level globally in 2012. The share was about the same in both developing and developed regions. Tertiary-level data for 135 countries reported during the period 2005–2012 showed that in 110 countries, the proportion of women teachers was below 50 per cent. Despite this general pattern, there are more women teachers than men at the tertiary level in Eastern Europe (Albania, Belarus, Latvia, Lithuania, Republic of Moldova and the Russian Federation), Latin America and the Caribbean (Aruba, Colombia, Cuba, Guyana and Saint Lucia), the Caucasus and Central Asia (Armenia, Azerbaijan, Georgia, Kazakhstan and Kyrgyzstan) and South-Eastern Asia (Malaysia, Myanmar, the Philippines and Thailand).⁵¹

D. Educational outcomes and lifelong learning

1. Literacy

Literacy⁵² is essential for accessing information, knowledge and skills, for acquiring the abilities to cope with the challenges and complexities of life, and to participate fully in society. A lack of literacy is strongly correlated with poverty and exclusion from social and economic opportunities.

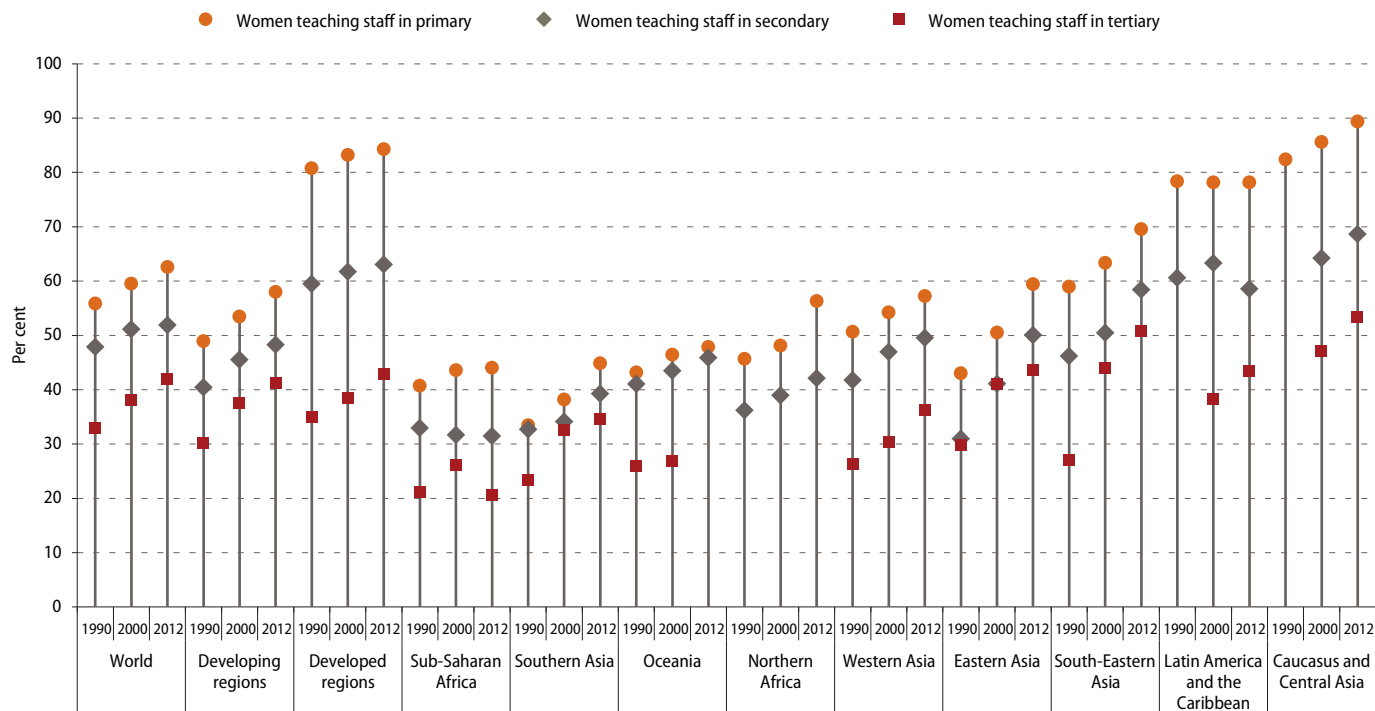
Women make up nearly two thirds of illiterate adults, a proportion that has remained unchanged for two decades

In 2012, an estimated 781 million adults aged 15 and over were illiterate, nearly all (99 per cent) of whom were found in developing regions. Nearly two thirds of the world's illiterate adults (496 million) were women, a share that has held steady since 1990. Women make up more than half of the illiterate population in all regions of the world. In Eastern and Western Asia, they make up nearly three quarters of the illiterate population.

⁵² UNESCO defines literacy as the ability to read, write and understand a simple statement related to one's daily life. It involves a continuum of reading and writing skills, and often includes basic arithmetic skills or numeracy.

⁵¹ *Ibid.*

Figure 3.15
Share of women among teaching staff by level of education and region, 1990, 2000 and 2012



Source: UNESCO Institute for Statistics, 2015. UIS Data Centre. <http://www.uis.unesco.org> (accessed in February 2015).

Note: Regions are listed in ascending order of women's share among teaching staff in primary.

Adult literacy rates have improved in all regions of the world for both women and men

Globally, in the period 1990–2012, the adult literacy rate⁵³ for men rose from 82 to 89 per cent, and for women from 69 to 80 per cent (figure 3.16). Northern Africa, sub-Saharan Africa, Southern Asia and Western Asia—all regions that in 1990 had literacy rates for both sexes significantly below global averages—have registered gains. Developing regions that had adult literacy rates above the global averages in 1990—namely, Eastern Asia, Latin America and the Caribbean, South-Eastern Asia and the Caucasus and Central Asia—have also seen progress, with Eastern and South-Eastern Asia showing considerable improvement, especially for women. At the country level, less than 50 per cent of adult women had basic literacy skills in 24 out of 158 countries with data for 2012 (or the latest year over the period 2005–2012). With the exception of Afghanistan, Bhutan, Haiti, Nepal and Pakistan, the other 19 countries were in sub-Saharan Africa. In com-

⁵³ The adult literacy rate is the percentage of the population aged 15 and over who are literate.

parison, the rate was less than 50 per cent for adult men in 8 out of the 158 countries.⁵⁴

Gender disparities in adult literacy rates have diminished globally, but women are still losing out to men in four developing regions

Between 1990 and 2012, the gender gap in adult literacy rates decreased in all regions (figure 3.16). The gap between the global rates for men and women was 8 percentage points in 2012, down from 13 percentage points in 1990. Developed regions, Latin America and the Caribbean, and the Caucasus and Central Asia have attained gender parity in adult literacy, while Eastern Asia, South-Eastern Asia and Oceania are close to attaining that goal. Gender disparity remains a serious concern in Northern Africa, sub-Saharan Africa, Southern Asia and Western Asia, where the gender gap was in the range of 10 to 22 percentage points to the advantage of men. The gap in Southern Asia and sub-Saharan Africa remains wide and persistent. In Southern Asia,

⁵⁴ Data based on UNESCO Institute for Statistics, 2014. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

progress was rapid in the period 1990–2000, but only modest gains have been made for women since 2000.

Of the 158 countries with data for 2012 (or the latest year over the period 2005–2012), 74 attained gender parity in adult literacy, 4 countries showed disparities to the disadvantage of men and 80 to the disadvantage of women. Women's literacy rates were less than two thirds those of men's in 22 of those countries, four of which are located in Southern Asia (Afghanistan, Bhutan, Nepal and Pakistan), one in Western Asia (Yemen), and the rest in sub-Saharan Africa.⁵⁵

The vast majority of young men and women have basic reading and writing skills

The vast majority of young people (aged 15 to 24) in the world are literate. Over the period 1990–2012, the global literacy rate for young women rose from 79 to 87 per cent and from 88 to 92 per cent for young men (figure 3.17). This reflects increased participation in formal schooling among younger generations. Youth literacy is almost universal in the more developed regions, in Eastern Asia and in the Caucasus and Central Asia; it is close to being universal in Latin America and in South-Eastern Asia. In parts of the world where many boys and girls do not attend school or drop out, youth literacy rates are much lower than global averages. In sub-Saharan Africa, where the rates are among the lowest in the world, only 64 per cent of young women and 76 per cent of young men are literate. In Oceania and Southern Asia, young men and women have attained basic literacy skills at rates significantly lower than the global averages for each sex.

From 1990 to 2012, gender gaps in youth literacy rates have decreased in all regions that showed disparities at the beginning of this period. However, gender gaps, to the disadvantage of young women, remain significant in Northern Africa, sub-Saharan Africa, Southern Asia and Western Asia, where they range between 4 to 12 percentage points in favour of young men.

The gender gaps in literacy rates among older persons show marked disparities against women

All regions of the world have shown progress in literacy for those aged 65 years and older. In 2012, the global literacy rate for this age group was 70 per cent for women and 81 per cent for men (figure 3.18). In 1990, the rates were much lower, at 56 per cent and 67 per cent, respectively. Developed regions and the Caucasus and Central Asia were the only regions approaching universal literacy for this age group in 2012. Latin America and the Caribbean was a distant second, with 75 per cent and 80 per cent of older women and men, respectively. The other regions had rates below the global averages for each sex. In developing regions as a whole, 51 per cent of older women and 72 per cent of older men were literate. The vast majority of older persons were illiterate in Northern Africa, sub-Saharan Africa and Southern Asia, where less than a quarter of women and less than half of men were literate.

In 2012, in developing regions as a whole, older women barely reached the 1990 literacy levels of older men. Among those regions that showed a significant gender gap in 1990, Eastern Asia, South-Eastern Asia and Western Asia have seen rapid progress in closing it. In contrast, Northern Africa, sub-Saharan Africa and Southern Asia saw a slight widening of the gap over the same period, despite rising literacy rates for both men and women.

2. Educational attainment in the population

Educational attainment—the highest level of education an individual has completed—is a measure of human capital and the skills available in a given population. Whereas current enrolment rates only provide information on the school population at a given time, educational attainment indicates the education level of an entire adult population, reflecting long-term trends in participation and completion of primary, secondary and tertiary education. Higher levels of educational attainment are reflected in the availability of a relatively high level of skills and knowledge in the labour force. Progress in educational attainment contributes to economic growth⁵⁶ and improved labour market outcomes, including in productivity, participation, and income and career progression. Beyond labour

⁵⁵ *Ibid.*

⁵⁶ Thévenon and others, 2012.

Figure 3.16
Adult literacy rates (age 15 and over) by sex and region, 1990, 2000 and 2012

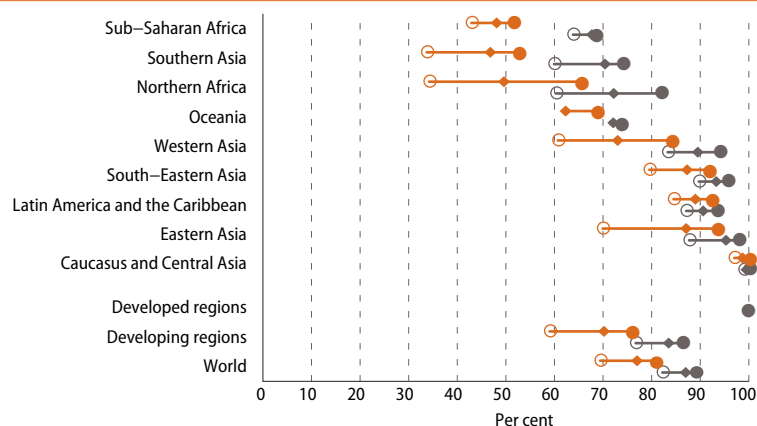


Figure 3.17
Youth literacy rates (age 15 to 24) by sex and region, 1990, 2000 and 2012

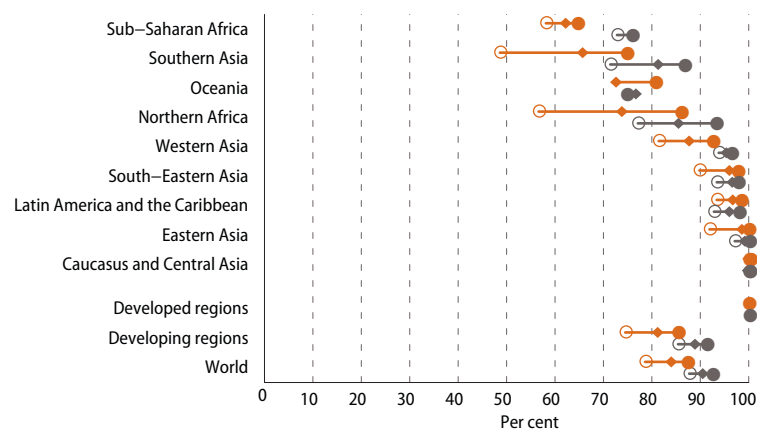
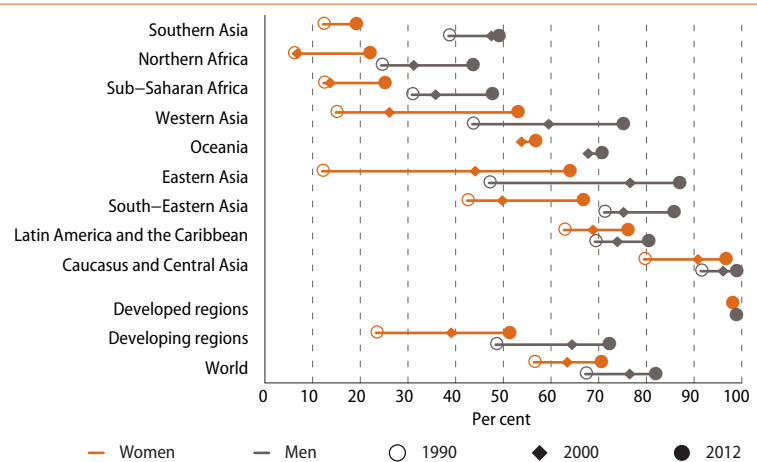


Figure 3.18
Literacy rates among older persons (age 65 and over) by sex and region, 1990, 2000 and 2012



Source: UNESCO Institute for Statistics, 2014.

Note: Because literacy data are not collected annually, the Institute for Statistics-UNESCO reports regional and global data on literacy rates in reference to census decades. For ease of reading, this chapter refers to data for the 1985–1994 census decade as data for 1990, and the most recent data, for the 2005–2014 census decade, as data for 2012. Regions are listed in ascending order of the literacy rate for women in 2012.

markets, a high level of educational attainment is also associated with positive social outcomes, including improvements in participation and representation in government and political influence,⁵⁷ volunteering and interpersonal trust,⁵⁸ and the health status and survival of children and other family members. Lastly, raising educational attainment is a key mechanism for the empowerment of women.

Figure 3.19 presents the highest level of educational attainment among men and women aged 25 and older as a percentage of respective populations in each region according to four educational levels: “no schooling”, “primary”, “secondary” and “tertiary”. There are significant variations in educational attainment across regions, suggesting a strong association with the general level of social and economic development. In developed regions, where universal primary education has been attained, the proportions of women and men with no schooling or whose highest attainment is at the primary level are small, while those whose highest attainment is at or above the secondary level are substantial. Most countries in Eastern Asia, Latin America and the Caribbean, South-Eastern Asia, Western Asia, and the Caucasus and Central Asia display a similar profile. In contrast, in sub-Saharan Africa and Southern Asia, where the goal of universal primary education has not yet been achieved, the proportions of women and men without schooling or whose highest educational attainment is the primary level are significant, but modest for those whose highest educational attainment is at the secondary or tertiary level.

Gender disparities against women are most evident among those with no schooling, particularly in sub-Saharan Africa and Southern Asia

Gender differences in the educational attainment of women and men aged 25 years or older are the starkest for the category of the population with no schooling. Some of the largest gaps are found in sub-Saharan Africa, where, on average, 44 per cent of women have never attended school, compared to 34 per cent of men. A gender gap of more than 15 percentage points in favour of men was observed in Benin, Burkina Faso, Chad, Ethiopia, Ghana, Malawi, Mali, Senegal, Togo, the United Republic of Tanzania and Zimbabwe.

⁵⁷ Lopez-Carlos and Zahidi, 2005.

⁵⁸ OECD, 2013.

Figure 3.19
Distribution of population aged 25 and over by sex, region and the highest level of education attained, 2005–2012 (latest available)



Source: Computed by the United Nations Statistics Division based on data from the UNESCO Institute for Statistics, 2014.

Note: Unweighted averages for regions with data for at least three countries. The educational attainment category of “no schooling” refers to all persons who have attended less than one grade at the primary level; “primary” comprises those who completed primary education (ISCED 1) or at least one grade of primary; “secondary” represents those who attended lower secondary (ISCED 2), upper secondary (ISCED 3) or post-secondary non-tertiary (ISCED 4); and “tertiary” comprises those who attended any tertiary education level (ISCED 5-6). The population whose education level is unknown has been proportionately distributed over the four categories of educational attainment. Regions are listed in descending order of the percentage of women with no schooling.

On the other hand, Kenya and Lesotho exhibited gender differences to the advantage of women among the adult population with no schooling. Gender differences are also large in Southern Asia. There, 34 per cent of women on average have no education at all, compared to 25 per cent of men. In Pakistan, 64 per cent of women have never attended school, 29 percentage points higher than for men. In Bangladesh, more than 57 per cent of women have no education, compared to 45 per cent of men. In the Western Asian countries of Bahrain, Jordan, Oman and the Syrian Arab Republic, gender gaps over 10 percentage points were recorded, all in favour of men. Some countries in South-Eastern Asia also showed moderate gender gaps in the range of 5 to 10 percentage points in favour of men.

Over a quarter of the adult population in developing regions has not completed education beyond the primary level. Primary education is the highest level of attainment for over 30 per cent of women and men in Latin America and the Caribbean, sub-Saharan Africa, Southern Asia, and South-Eastern and Western Asia. In the case of South-Eastern Asia, 43 per cent of women and 40 per cent of men have attained education only up to the primary grades. The corresponding figures for sub-Saharan Africa are 32 per cent and 34 per cent of women and men, respectively. On the other hand, in developed regions, as well as in Eastern Asia and the Caucasus and Central Asia, the proportions are less than 20 per cent for both women and men.

Secondary education is the highest educational level attained by most women and men across both developed and developing regions

Compared to other levels of education, secondary education is the level attained by most adults across both developed and developing regions. Worldwide, the average is 49 per cent of women and 54 per cent of men. In the Caucasus and Central Asia, for nearly three quarters of both men and women secondary education is the highest level of educational attainment. In developed regions and Eastern Asia, more than half of adult women and men have attained that education level, and is the most common highest education level achieved for about 4 in 10 men and women in Latin America and the Caribbean, South-Eastern Asia and Western Asia. Twenty-two per cent (one in five) of women in sub-Saharan Africa on average have some secondary education, compared to 29 per cent of men. Secondary education is also the highest level of attainment for 26 per cent of women and 33 per cent of men in Southern Asia, whereas in Bangladesh, Maldives and Pakistan, the number is less than 25 per cent. These countries display a gender gap in the range of 3 to 21 percentage points, revealing moderate to severe educational disadvantages for women.

On average, 18 per cent of adult women and men globally have attained tertiary education. Tertiary education is most common in the developed regions, Eastern Asia and the Caucasus

and Central Asia, where more than one in five of men and women have attended or graduated from post-secondary education. Tertiary education is least common in sub-Saharan Africa and Southern Asia, where those who have attained post-secondary education constitute only a small minority of the population.

3. Adult education

UNESCO defines adult education as “education specifically targeting adults to improve their technical or professional qualifications, further develop their abilities, enrich their knowledge with the purpose to complete a level of formal education, or to acquire knowledge, skills and competencies in a new field or to refresh or update their knowledge in a particular field.”⁵⁹ Adult education programmes are extremely diverse⁶⁰ and may differ in terms of objectives, focus, target groups, content, pedagogy and scale. In the more developed countries, adult education tends to be more focused on the enhancement of skills, while in the less developed countries the emphasis is more on literacy programmes and the completion of basic education. Providers are also very diverse, consisting of governments, non-governmental organizations, local communities and employers. Adult learning can play an important role in helping adult men and women to re-enter the labour market, and provide skills to meet the needs of a changing social and economic context, or new knowledge and skills to enhance employment opportunities, including self-employment and entrepreneurship. Adult learning can also contribute to non-economic goals, such as personal fulfilment, improved health, civic participation, social inclusion, volunteerism and traditional knowledge.

⁵⁹ UNESCO Institute for Statistics, 2014a.

⁶⁰ Adult education may encompass formal and non-formal education and training, including: continuing education; recurrent education; equivalency or second chance education; professional development; literacy and post-literacy programmes; adult basic education; ICT training; religious, cultural and political education; technical, vocational and entrepreneurship education and training; income-generation programmes; and other programmes focusing on life skills, livelihoods and community development.

In most European Union countries, women participate slightly more than men in adult education

Available data⁶¹ from a 2013 European Union (EU) survey⁶² on adult lifelong learning involving 28 countries showed that the average participation rate in adult education and training among the 25 to 64 age group, regardless of the respondent's level of education, stood at 11 per cent for women and 10 per cent for men (figure 3.20). Those figures were only slightly higher than the corresponding figures for 2004. Participation in adult education and training varied considerably across countries. Denmark had the highest participation rate (27 per cent of women and 36 per cent of men), while at the opposite extreme, Bulgaria had only 2 per cent of women and men who were engaged in adult education. In most countries, women were more likely to participate in learning activities than men, except in Germany, Greece and Romania; however, the sex differential in participation rates in those countries was small.

Adults with already high levels of education participate in adult learning at a higher rate than those with lower educational attainment

The data show a strong positive relationship—consistent across countries—between participation in adult education and the level of educational attainment. Adults with already high levels of education participate at a higher rate, while those with lower levels participate at a lower rate (figure 3.20). There are a number of reasons to explain this. For one, demand for training might be higher among individuals with higher levels of education because they already have the skills that facilitate learning, and are more likely to be in jobs that demand ongoing training. Regardless of the educational level, in most countries,

⁶¹ Because of the large variation in adult learning programmes and the lack of a common understanding about which categories of learning activities should be included, this section is limited to statistics on participation in adult education only for those countries that take part in the annual European Union Labour Force Survey and those that participated in UNESCO's Regional Project for Education in Latin America and the Caribbean (PRELAC).

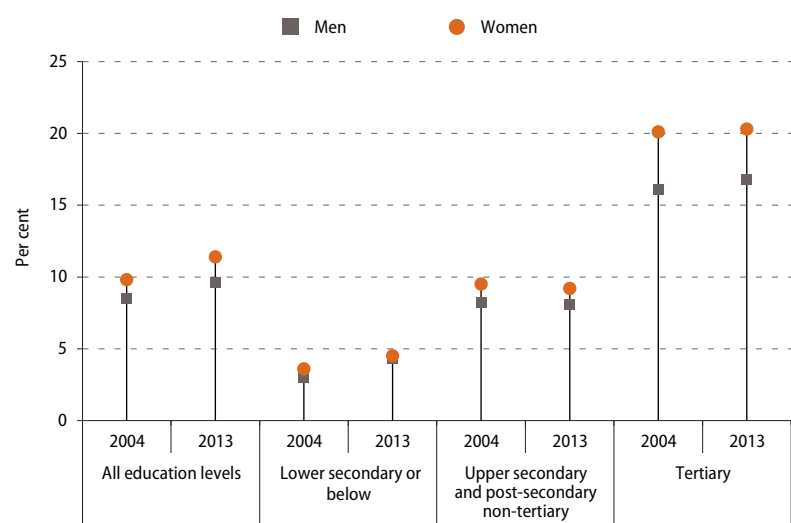
⁶² The European Union Labour Force Survey (LFS) provides annual results for the indicator “lifelong learning” (defined as the participation of people aged 25 to 64 in education and training) used for regular EU policy monitoring. The reference period for participation in education and training is the four weeks prior to the interview.

women's participation rates are higher than those of men. Gaps between women's and men's participation rates are significant in the group with tertiary education. For lower educational attainment levels, gaps between women and men are smaller or insignificant.

In Latin America and the Caribbean, women constitute the majority of participants in adult education programmes

In Latin America and the Caribbean, women constitute the majority of participants in adult education. However, participation and completion vary widely across countries. In 11 out of 13 countries with available data, the women's share exceeded that of men's in adult literacy programmes.⁶³ In the case of primary education for adults, a similar gender pattern is observed. Participation in lower and upper secondary education programmes for adults show stronger gender parity⁶⁴ in most countries with data. The proportion of women and men participating in lower secondary education is in the range of 45 to 55 per cent in 8 out of 16 countries with data. The corresponding figure is 10 out of 14 countries for upper secondary education. Where participation is out of the parity range, women tend to participate at a higher rate than men in both lower and upper secondary education.⁶⁵

Figure 3.20
Adult education and training participation rates in 28 European Union countries by sex and level of educational attainment, 2004 and 2013



Source: EUROSTAT database, 2014. <http://ec.europa.eu/eurostat/data/database> (accessed 5 December 2014).

Note: The annual European Union Labour Force Survey collects statistics on lifelong learning for the population aged 25 to 64 years. The reference period for participation is four weeks prior to the survey.

⁶³ Data based on UNESCO Institute for Statistics, 2014c. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.

⁶⁴ Gender parity is defined here as a share of between 45 and 55 per cent (inclusive) for each sex.

⁶⁵ Data based on UNESCO Institute for Statistics, 2014c. Data shown in the Statistical Annex. <http://unstats.un.org/unsd/gender/worldswomen.html>.