



# World Data on Education

## Données mondiales de l'éducation

### Datos Mundiales de Educación

VII Ed. 2010/11



## Kazakhstan

*Updated version, August 2011.*

### Principles and general objectives of education

Article 30 of the Constitution approved in 1995 stipulates that citizens have the right to free comprehensive secondary education in State educational institutions. Citizens also have the right to free higher education in State institutions on a competitive basis.

The Education Law, adopted in 1992, established the new principles and objectives of education. In accordance with Article 3, the basic principles of education in the country are the following: equality of citizens in their right to receive education; diversification of educational institutions in terms of ownership, direction of activities, forms of education and training; continuity in the process of education; scientific and secular character, and ecological orientation of education in state educational institutions; democracy in the management of the education system.

The Law of 1992 determines the common purposes and tasks of education as follows: “the main task of the education system is to create the necessary conditions for bringing up and developing individuals on the basis of national and common human values, and of scientific and practical achievements.” The main objectives of the education system are to:

- develop the mental and physical abilities of individuals, to lay solid foundations of morality and a healthy way of life, to cultivate their intellect providing conditions for their further development;
- foster civic awareness and the understanding of individual rights and duties with regards to the family, the society and the State;
- develop the creative abilities of individuals and their aesthetic education;
- create the necessary conditions for the study of culture, customs and traditions of Kazakhstan; and
- provide all citizens with opportunities for general education and professional training.

### Laws and other basic regulations concerning education

Since independence, the Republic of Kazakhstan is creating the new legal base of the education system. The two main laws regulating education in the country are the **Law on Education** of 7 July 1992 and the **Law on Higher Education** of 1993. These laws determine the State educational policy, the objectives and principles of education, the administrative structure, and the system of private schools. They also ratify the democratic character of the education system and the administrative and financial decentralization of educational institutions, and they guarantee the autonomy of academic institutions, colleges and secondary schools.

The Law on Education provides for the following levels of education: preschool, secondary, vocational and technical secondary, higher and postgraduate



education. Secondary education consists of three stages: elementary (four-year programme), basic secondary (five years) and senior secondary (two years). The Law regulates the public relations in the sphere of education, defines the basic principles of national policy-making in this area and aims at ensuring protection of the constitutional right of citizens to education. Article 23 stipulates that preschool education for 5(6)-year-olds shall be mandatory and it shall be provided in the family, preschool organizations or schools under a general educational programme. In State educational organizations, such education shall be free. The Law also introduced a new model of higher professional education, consisting of three levels: basic higher education (four-year bachelor's degree programmes), four-year specialized higher education courses, and higher scientific education (two-year master's degree programmes).

New regulations have been adopted in accordance with the two above-mentioned laws, including the State standards for higher education. The **Regulations for organizing the activities of pre-school organizations** (Order of the Ministry of Education and Science No. 708) were approved on 10 July 2000. Early childhood orphanages are subject to the **Rules for Early Childhood Orphanages' Activities** and **Rules for Children's Admission and Dismissal from Early Childhood Orphanages** of 2000.

The new **Law on Education** was adopted on 27 July 2007 and takes into consideration international standards in the field of education in view of Kazakhstan joining the World Trade Organization and integration with the Bologna process. The **Resolution of the Government No. 1762** on the Issues of Children's Compulsory Pre-primary Preparation states that one-year pre-primary education can be set up in general secondary schools (as pre-primary classes) or in preschool organizations (as pre-primary groups).

## **Administration and management of the education system**

The central executive body responsible for the management of the education system is the **Ministry of Education and Science (MES)**. The Ministry defines and executes state policy in the field of education, culture and public health, tourism and sports. Strategic planning and funding of the education system, including the preparation of draft education budgets, are under the supervision of the Ministry.

In accordance with the Education Law, the functions of the MES include: defining and executing the State educational policy; drafting regulations concerning State funding for education; drafting and adopting State educational standards, curricula and syllabi; preparing State orders concerning the training of specialists; providing assistance in the organization of the educational process in the Kazakh language; and establishing international agreements on educational issues.

The Ministry also supervises educational institutions funded from the regional budgets and private educational institutions in accordance with current legislation. Regional educational authorities are under the Ministry's supervision.



The MES consists of several Committees and Departments (Administration and Finance) as follows: Higher and Postgraduate Education Department, Secondary Education Department, Technical and Vocational Education Department, Development Strategy Department, Administrative Department, Legal Affairs Department, Financial Department, Public Procurements and Information Technical Provision Department, Control Committee in the sphere of Education and Science, Children Rights Protection Committee, and Science Committee. The **National Testing Center** is responsible for the national testing/examination of secondary school graduates. The **National Academy of Education** is the leading research organization in the field of pedagogy, methodology and assessment of the educational process. (MES, 2010).

In addition to the two cities of Almaty and Astana, there are 14 provinces (*oblast*) in Kazakhstan further divided into a number of districts (in 2007 there were 14 *oblasts*, 160 regions, 39 cities with oblast status, 45 cities with regional status, and 7,862 rural settlements; see MES, 2008). In each *oblast* and district there is the **Department of Education** formed by the regional/municipal authorities functioning as a regional/municipal board of management in the sphere of education. These departments execute the national strategy in the field of education at the regional level and determine the amount of funds allocated to education from the regional budgets.

Regional education boards are responsible for: the establishment, organization and management of educational institutions (kindergartens, secondary schools, technical-professional schools, colleges) at the local level, and the provision of material and technical resources; the appointment of the heads of educational institutions; financing of educational institutions from the regional budget; and enforcing compulsory secondary education.

The **Ministry of Labour and Social Protection** is in charge of the rehabilitation of children with disabilities under the Law on Social Protection of Invalids. It also finances and administers support programmes for low-income families under the Law on State Targeted Social Support of 2001. The **Ministry of Health** develops a policy of basic health services to be provided to children and their mothers, undertakes initiatives for early detection of risk groups in cooperation with oblast education departments, and manages the system of early childhood orphanages. No coordination mechanism for early childhood exists at the national level. (Penn, 2004; UNESCO, 2005).

The national system of assessment of the quality of education has been established to improve supervision and management of education, and to provide all stakeholders and society as a whole with information on the level of academic proficiency. In this process a significant role is played by the **National Centre for Assessment of Quality of Education (NCAQE)**, established in accordance with the State Programme Education 2000-2005. (MES, 2008).

Article 36 of the 1992 Law on Education guarantees the principle of self-government of educational institutions. The management body of educational establishments is the **Council**. The organization of the educational process in technical-professional schools and colleges is under the responsibility of the **Academic Board**.

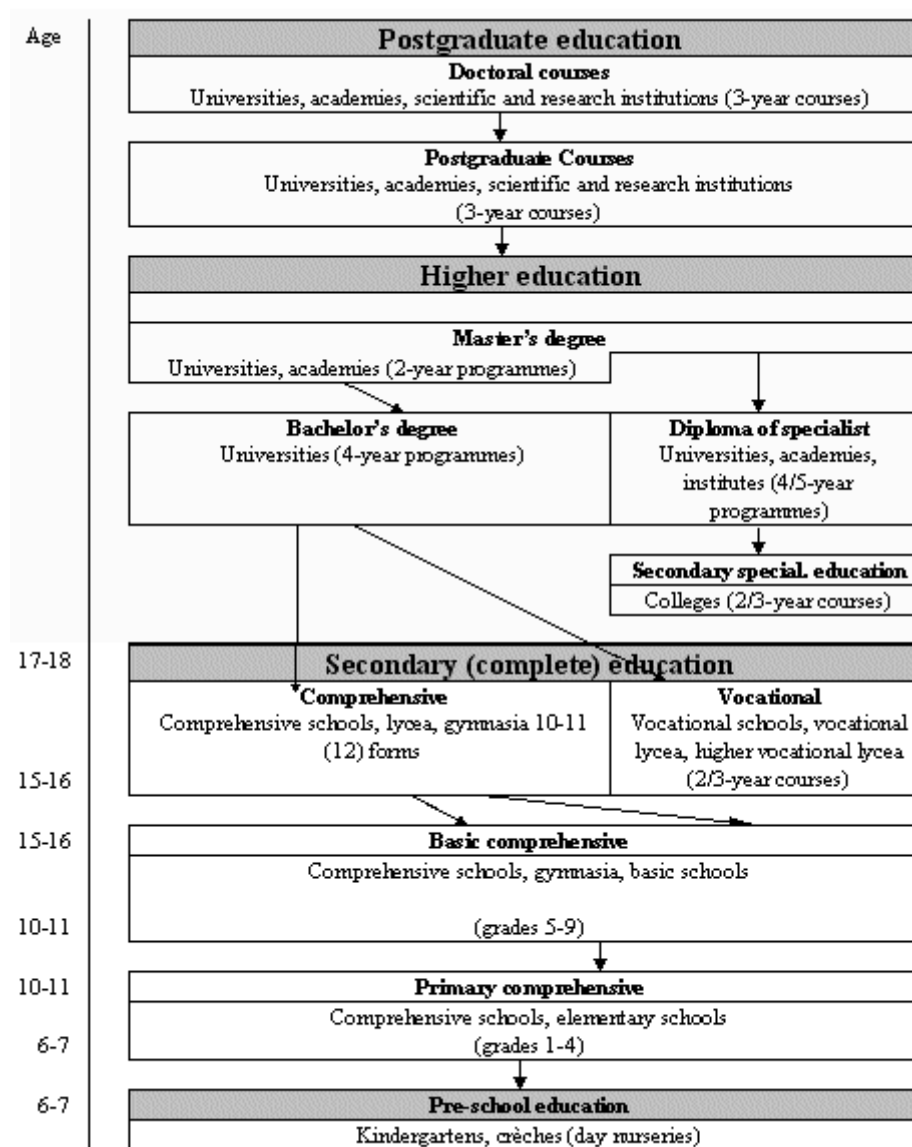


Universities, colleges and schools can define their own curricula within the framework of State educational standards. With the approval of the Committee for Education, universities may also define the programme for students' admission. The **Central Managerial (Monitoring) Body for Higher Education** is responsible for the assessment and certification of universities. Assessment activities are carried out in order to better evaluate the quality of education provided by universities, the application of national standards, the utilization of budget allocations, and to stimulate creativity among university faculties and students' bodies.

In 2007 the higher education quality assurance system was many layered. Players in the system included the MES; the ministry's **Committee for Supervision and Attestation**; the National Centre for Educational Quality Assessment; the National Accreditation Centre; the **Centre for Certification, Quality Management and Consulting**; and the **National Centre of State Standards for Education and Tests**. All these agencies were involved, directly or indirectly, in aspects such as licensing higher education institutions to operate, checking their compliance with licensing requirements, attestation, accreditation and interim control. In 2007, all came under the jurisdiction of the MES, though the National Accreditation Centre hoped to become independent. (OECD & World Bank, 2007).

## Structure and organization of the education system

### Kazakhstan: structure of the education system



### Pre-school education

Early childhood care and education is for children between the ages of 1 and 6. Until 1993, preschool education in kindergartens (age group 3 to 6) run by municipal education departments and employers (State enterprises and agencies) was provided free of charge. According to Article 23 of the Education Law, preschool education for 5-6-year-olds shall be mandatory.



## Primary education

Elementary education lasts four years and is the first stage of compulsory education. It is possible to enter school at the age of 6 by passing entrance tests, but the majority of children enrol at the age of 7.

## Secondary education

Secondary education consists of two levels: basic (five years' duration) and senior secondary (two years' duration). Students completing basic secondary education and having passed the final examination receive a certificate. Students completing senior secondary and having passed the final examination receive the certificate of complete secondary education. Students can enter technical and vocational schools after completing basic secondary (grade 9) for a three- to four-year training programme, or with complete secondary (grade 11) for a training programme lasting two to three years. Secondary education is free and in principle compulsory. The transition to a twelve-year education system (e.g. primary education covering grades 1-4; basic secondary, grades 5-10; and secondary education or profile training, grades 11 and 12) is expected to be completed by 2015.

## Higher education

After completing (full) secondary education, students may continue their education in higher education institutes and universities, or in colleges offering specialized (vocational) secondary education (two- to three-year programmes). In Kazakhstan, lower tertiary education is referred to as 'secondary vocational education'. It may be started in secondary vocational schools (lyceums), but is generally completed, and qualifications awarded, at colleges. Some colleges are affiliated to and part of universities. These may be regarded as part of higher education, but most colleges, run and financed by local authorities, are not. (OECD & World Bank, 2007). At the higher education level, four years of study are normally required for the award a bachelor's degree (first level degree), and a master's degree requires an additional one to two years of study (second level degree). Technical universities, academies and institutes normally offer four- or five-year programmes leading to the Diploma of Specialist, and in medical universities the duration of studies is five years or more. Postgraduate studies leading to the qualification of Candidate of Science normally last three years. The diploma of Doctor of Science is awarded after a minimum of three years of study and completion of a thesis concerned with original research. The country has moved from teaching within 342 different narrow specialties (courses or programmes) to fewer, broader specialties, and has decided to adopt a major structural reform commonly known as the Bologna process. The country is already reshaping most university programmes into Bologna's three levels: bachelor's degrees (four-year programmes), postgraduate master's degrees (two years of study) and doctoral programmes (four to five years of study). (OECD & World Bank, 2007).

In 2008, the school year consisted of thirty-two working weeks (five-day weeks in grades 1-8, and six-day weeks in grades 9 and 10).



## The educational process

After gaining independence in 1991, the country has made continuous improvements in the (compulsory general) secondary education curriculum. In 2002, a complex description of the content of secondary education (e.g. State Standards) was adopted. In their overall approach, the 2002 Standards follow the former prescriptive model of content regulation, which defines items of knowledge, skills, and capacities to be obtained in a large number of learning areas (13-23 study subjects, depending on the level of secondary education). A Concept Paper approved by the government as basis for the State Programme for Developing Education in Kazakhstan in 2005-2010 acknowledges that the education system is based on out-dated methodology and content. The State Programme 2005-2010 defines the change of curriculum towards an outcomes-oriented model as one of the main aims. Outcomes-oriented means that the new system will be based on a normative framework of expected outcomes, which substantially differs from the content regulation, which is input-based (defining what knowledge to learn, when, and how much time will be needed). The outcome-oriented model also creates a firm link with assessment and quality assurance.

The outcomes are at the same time defined not as the remembering of facts and the performing of narrowly defined tasks, but as the developing of general and specific competencies. These competencies will be defined at three levels, namely: general competencies, subject area expected outcomes, and subject-based outcomes. Along with this change, content regulation will concentrate more on general competencies and nine learning areas: language and literature; man and society; social studies; mathematics; informatics; science; arts; technology; and physical education. This vision allows for a balanced differentiation of content and quality control as the expected outcomes are defined more broadly and will involve higher order skills like critical thinking and problem solving. This means that content can be differentiated to some extent in accordance with the interests of students. It also allows for school-based curriculum development and community involvement. Further, defining expected outcomes in terms of competencies creates a better link with the labor market as the expected outcomes can be negotiated with employers. Additionally, the development of competencies should include development of life skills, which are a crucial deficiency in the present curriculum content. (Government of Kazakhstan, 2005).

### Pre-primary education

Preschool education caters to children aged 1-6/7. The main objectives at this level as defined by the Ministry of Education in 2003 are to: develop mental and physical abilities; strengthen children's health and promote the values of a healthy lifestyle; ensure harmonious personality development and prepare children for school. Teaching activities are mainly focused on reading, writing, numeracy, drawing and music. Many kindergartens also offer early exposure to foreign languages. Preschool education is mainly funded by the local authorities.

At independence in 1991, Kazakhstan had the best preschool provision of any Central Asian Republic, covering approximately 50% of children under the age of 7. There were 8,743 kindergartens, over half of which were in rural areas. Much of this provision was workplace based. As factories and collective farms closed, so did the





services they provided. The pre-school institutions network run by State enterprises and agencies has been practically destroyed, and the number of pre-schools abruptly decreased because of the economic crisis. Seven out of eight kindergartens closed, the majority in rural areas. The proportion of children covered fell to 11% per cent in 1998. In recent years, the country's preschool network is being restored. At beginning of the 1999/2000 school year there were 1,158 pre-school institutions with a total enrolment of 124,800 children. In 1997, the national programmes for kindergartens *Balbobek* and *Bringing up and educating pre-school children in the family and in kindergartens* were launched.

The state mandatory standards for early childhood care and education, e.g. "Mandatory Minimum of the content of the comprehensive educational programme of early childhood care and education of children aged 1-6 years" was adopted by MES Order No. 411 of 29 September 2004. The idea of the personality-focused education, development of talents of preschool children through an activity specific for the given age – mainly play – was the main basis for developing the standards. In order to decrease disparity in coverage of urban and rural children in preschool programmes, the MES adopted the Order No. 372 on 7 July 2006, "Standard Rules of organizing the activity of pre-school mini-centers." According to the Rules, preschool mini-centers can be state-owned or private. They can be created as structural divisions of preschool, out-of-school and special learning institutions, and organizations of secondary education. Preschool mini-centers can function on a flexible basis 2-7 times a week, 2-10 hours a day, both in the morning and in the afternoon. Groups of preschool mini-centers can be opened within an academic year as they enroll enough children. (MES, 2008).

The Ministry of Education is the main provider of formal early childhood services. A small but growing number of private early childhood services are in operation. They are either formal (e.g., full-time and part-time nurseries, centres for children aged 1+ to 3+, preschool groups for children aged 1+ to 6+/7+ in kindergarten schools, pre-primary education classes in comprehensive secondary schools for children aged 5+ to 6+) or informal (e.g., babysitters, nanny services). The Ministry monitors the former but does not finance them.

One-year pre-primary education for children aged 5+/6+ became free and compulsory in November 1999 through the Resolution of the Government on the Issues of Children's Compulsory Pre-primary Preparation (No. 1762). The Resolution states that one-year pre-primary education can be set up in general secondary schools (as pre-primary classes or "PPE Classes") or in preschool organizations (as pre-primary groups or "PPE Groups"). Both PPE Classes and PPE Groups are free. The half-day PPE Classes were devised to target rural children who did not go to kindergartens and did not have the opportunity to prepare for formal schooling. The enrolment rate of rural children in PPE Classes grew steadily from 48.4% in 2001 to 56.7% in 2004. (Penn, 2004; UNESCO, 2005).

According to national data, in January 2010 there were 4,972 preschool organizations in the country enrolling a total of 373,100 children, or 38.7% of preschool age children. The number of 5-6-year-olds enrolled in the pre-primary class was about 271,400 children, or 83% of pre-primary school age children. (Government of Kazakhstan, 2010).



In January 2007 there were 1,391 preschool institutions and 724 preschool mini-centres with about 21,400 pedagogical staff. In terms of qualifications: 47% had higher pedagogical education (including 32.7% of specialists certificated in preschool education, five-year programme); 46.2% had secondary special pedagogical education (including 62% graduates of three-year pedagogical colleges with preschool education specialization); 5.7% had incomplete higher pedagogical education (a third of them studying to get the preschool education specialization); and 1.1% were secondary school graduates. There exist considerable regional gaps in coverage. For example, in 2006 in the Kostanai oblast the coverage of 1+/6+ year-olds was 57.9% of total number of children of this age, whereas in Almaty oblast it was only 7.1%. The average coverage of urban children was estimated at 38.7%, in comparison with 12.4% in rural areas. Preschool mini-centers are intended to increase opportunities of accessing early childhood care and education (ECCE). Educational programmes for ECCE mini-centres are different from kindergarten programmes, because kindergartens have a full-time schedule and groups of children of the same age, while preschool mini-centres have a flexible schedule and children of different ages. In 2007, the ECCE network (e.g. 1,391 institutions) included: day nurseries (age group 1-3) functioning 10 hours per day; kindergartens for the age group 3-6+, consisting of kindergartens (10 hours), day nursery-kindergarten (age 1-6+) (10 hours); kindergarten-school complex (10 hours), ECCE centers (mini-kindergarten, home kindergarten, mini preschool centres; age group 3-5) functioning part-time on a flexible basis, and ECCE groups in orphan asylums (age 4-7) (24 hours). (MES, 2008).

## Primary education

Primary education is compulsory and lasts four years. The main objectives of primary education are to teach children to read and write, to develop basic skills in numeracy and simple arithmetical operations, and to teach the elementary basis of social and natural disciplines.

The lesson timetable for primary education (2008) is shown in the table below:

### Kazakhstan. Primary education: weekly lesson timetable

Learning area/subject	Number of weekly periods in each grade			
	1	2	3	4
<i>Language and literature:</i>				
Writing	7	–	–	–
Kazakh language and literature	–	7	7	6
Russian language	–	2	2	2
Foreign language	–	–	1	2
<i>Mathematics and computer skills:</i>				
Mathematics	4	4	5	5
Informatics	–	–	1	1
<i>Man and society:</i>				
The world around us	2	2	2	2
Knowledge of oneself	1	1	1	1
<i>Arts and technology:</i>				
Music	1	1	1	1
Handicraft	2	2	2	2
<i>Physical training</i>	3	3	3	3
<b>Total weekly periods</b>	<b>20</b>	<b>22</b>	<b>25</b>	<b>25</b>
Optional lessons	1	1	1	1
Additional lessons	1	1	1	1
<b>Total weekly periods (max.)</b>	<b>22</b>	<b>24</b>	<b>27</b>	<b>27</b>

Source: Ministry of Education and Science, *State Standards for Primary Education*, 2008. Each teaching period lasts 35 minutes in grade 1 and 45 minutes in grades 2-4.

Schools are free to define their own programmes as far as additional and optional lessons are concerned. Upon completion of primary education, pupils are admitted to grade 5. In some schools there are examinations in Kazakh or Russian language and mathematics.

In 2004/05, there were 101 different specialized correctional institutions for children with different special needs. The total number of students attending these institutions was 22,800. Still, the estimated number of school-age children with



special needs was 120,000, and only one-third of them were learning in specialized institutions. (Government of Kazakhstan, 2005).

A 2006 households survey revealed that 92.9% of all children of primary school age were enrolled in grade 1. (UNESCO Almaty, 2008).

## **Secondary education**

The main purposes of secondary education are: to lay down a common cultural and scientific basis through the compulsory general education programmes; to facilitate the social adaptation of students to life in the community; to develop the sense of citizenship and love of Motherland; and to provide the national community with qualified workers and specialists.

Secondary education consists of two stages: basic (grades 5 to 9) and senior secondary (grades 10 and 11). All secondary schools follow the curriculum approved by the Ministry of Education and Science with a few modifications. Under the new twelve-year education system model, to be fully implemented by 2015, basic secondary will cover grades 5-10, and (senior) secondary education or profile training, grades 11 and 12.

The lesson timetable for general secondary education (2008) is shown below:

## Kazakhstan. General secondary education: weekly lesson timetable

Learning area/subject	Number of weekly periods in each grade					
	5	6	7	8	9	10
<i>Language and literature:</i>						
Kazakh language	4	4	3	3	3	3
Kazakh literature	3	3	3	3	3	3
Russian language	3	3	3	3	3	3
Foreign language	2	2	2	2	2	2
<i>Mathematics and computer skills:</i>						
Mathematics	5	5	–	–	–	–
Algebra	–	–	4	3	2	2
Geometry	–	–	1	2	2	2
Computer skills	1	1	1	1	1	1
<i>Natural sciences:</i>						
Natural sciences	2	2	–	–	–	–
Geography	–	–	1.5	1.5	2	2
Biology	–	–	1.5	1.5	2	2
Physics	–	–	2	2	2	2
Chemistry	–	–	–	2	2	2
<i>Man and society:</i>						
Social studies	–	–	–	–	2	2
History of Kazakhstan	1	1	1	1	1	1
History	–	2	2	2	–	–
Knowing oneself	1	1	1	1	1	1
<i>Arts:</i>						
Music	1	1	1	–	–	–
Drawing	1	1	1	–	–	–
Creative culture	–	–	–	1	1	1
Technology	2	2	2	2	2	2
Physical training	2	2	2	2	2	2
Optional lessons	3	3	3	2	2	2
<b>Total weekly periods</b>	<b>31</b>	<b>33</b>	<b>35</b>	<b>35</b>	<b>35</b>	<b>35</b>
Additional lessons	2	2	2	2	2	2
<b>Total weekly periods (max.)</b>	<b>33</b>	<b>35</b>	<b>37</b>	<b>37</b>	<b>37</b>	<b>37</b>

Source: Ministry of Education and Science, *State Standards for Secondary Education (2008)*, 2009. Each teaching period lasts 45 minutes. In grades 9 and 10 the school week consists of six days.

In 2004/05 there were 8,221 schools in Kazakhstan, of which 6,080 (74%) were in rural areas. The rural schools were attended by 47% of the overall number of students. Among the rural schools, there were 1,158 primary schools (14% of the overall number of schools), 1,154 basic schools (grades 1-9, 7% of the total number of schools) and 3,741 secondary schools (45.5% of the total). There were only 12 schools for children with special needs and 24 schools with curricular emphasis on



learning certain subjects in rural areas. Secondary education is provided in five main languages of instruction: Kazakh, Russian, Uigur, Uzbek, and Tajik. As the schools with Kazakh and Russian as languages of instruction are spread evenly throughout the country, schools with Uigur, Uzbek, and Tajik as languages of instruction are situated in the regions where these languages are mother tongues of a considerable percentage of students. The number of schools with Kazakh as the language of instruction has increased from 44.3% in 2000 to 45.9% in 2003, while the number of schools where Russian is the only language of instruction has decreased from 29.4% to 26.8%. This is connected to the policies supporting the development of Kazakh as the state language. (Government of Kazakhstan, 2005).

In 2006/07, the number of day-time secondary schools under the Ministry of Education (not including special correctional institutions) was 7,802, of which 1,190 were primary, 1,189 basic secondary, and 5,423 secondary schools. Out of the total, 5,967 schools were located in rural areas and 1,651 in urban areas. The total enrolment (primary to secondary) was 2,778,077 students. In addition, there were 133 private schools with a total enrolment of about 17,000 students. Total enrolment in 101 correctional institutions and 766 special grades operate at secondary schools was 23,913 students. In 2006/07, a total of 3,747 schools offered instruction in Kazakh language, 1,898 schools in Russian, 72 schools in Uzbek, 14 schools in Uighur, three schools in Tajik, and one school in Ukrainian. In addition, in 2,067 schools education was conducted in two or more languages. At the beginning of 2006/07, in regular state-owned educational institutions, the number of pupils in grades 1-4 (primary school) was 930,948 (of whom 48.9% were girls). The number of students in grades 5-9 (middle school) was 1,394,974 (of whom 49% were girls). The number of students in grades 10-11(12) was 342,530 (of whom 52.7% were girls). (MES, 2008).

The higher stage of secondary education also includes vocational schools (VC), where students besides academic secondary education can obtain a professional diploma in different specialties. Graduates from basic and secondary schools are accepted in VCs. The number of VCs in 1997 was 307, with more than 112,000 students enrolled. The training of qualified workers is carried out in more than 300 professions. Graduates from basic secondary schools (grade 9) normally follow a three- to four-year training programme, while those who have completed (full) secondary education (grade 11) follow training programmes lasting two to three years.

There is a developed system of specialized secondary schools, including colleges. The primary goal of specialized secondary education is the training of skilled workers. In 1998, the number of specialized secondary schools and colleges was 243, of which 172 were State-owned. The training of specialists was carried out in 160 fields. Colleges offer two- to three-year programmes mainly for grade 11 graduates and train specialists according to the new State standards and educational plans, prepared on the basis of the new Classification of secondary specialized education specialties introduced in 1996.

In 2006/07 there were 320 vocational schools, most of which (289) were state-owned. The total enrolment was about 108,100 students. In the same year, the number of colleges and specialized secondary schools was 510 (of which 201 were state owned), with a total enrolment of about 450,600 students. In addition to the formal system of vocational education, there is an extended and comprehensive network of



complementary vocational education for youth and adults including training centres, profit-making learning institutions, sectoral training institutions, professional development courses, etc. (MES, 2008).

Students' assessment is carried out according to the following marks: 5 (excellent), 4 (good), 3 (satisfactory), and 2 (unsatisfactory). Along with the traditional assessment methods, standardized tests are being introduced. State examinations include four to five subjects, both compulsory and of the student's choice. The list of compulsory subjects is adopted by the Committee for Education and includes mother tongue (Russian and Kazakh) and mathematics.

State standards for specialized secondary education and new educational plans are prepared taking into account current demands. The duration of courses is being reduced, and up-to-date subjects are being introduced. Subject content and practical training are being reconsidered, and measures are being taken in order to satisfy the growing need for textbooks, especially in the Kazakh language. A network of a new type of general education institutions (gymnasia and lyceums) is being developed: 178 gymnasia and 142 lyceums have already been established.

Secondary school enrolment is high, with 95.3% of secondary school age children enrolled in schools. Secondary school children comprised over two-thirds (64.8%) of all school children in 2006/07, with half of all these children living in rural areas. While the total number of children enrolled in secondary school has declined largely due to the drop in birth rates in the mid 1990s, this trend is expected to reverse in the coming years given the sharp increase in number of births beginning in 2002. (UNESCO Almaty, 2008).

### **Assessing learning achievement nationwide**

The first national assessment of learning achievement in the Republic of Kazakhstan was conducted over a sample of 3,500 grade 4 pupils within the framework of the EFA 2000 programme in May 1999. The average success rate in the literacy test was 77.9%, in numeracy 80.5%, and in life skills 75%. Overall, girls performed better than boys, pupils of urban schools performed better than those of rural schools, and pupils attending Russian-language schools performed better than those attending Kazakh-language schools.

The new National System of Assessment of the Quality of Education, which is under development for all levels of education, foresees heavy reliance on external assessment. The State Programme for the Development of Education in the Republic of Kazakhstan in 2005-2010 approved in October 2004 includes a provision for sample-based monitoring of learning outcomes at the end of grade 4. The tests are to be administered in mathematics and the mother tongue. According to the results of the Unified National Testing (UNT), introduced in 2004 and piloted in 2003, the achievement of graduates of rural schools and schools with Kazakh as the language of instruction was comparatively lower than the results of graduates of urban schools and schools with Russian as the language of instruction. (Government of Kazakhstan, 2005).





From 2007 to 2009, UNT average scores improved from 63.3 to 74.9, as well as the results of the Interim State Monitoring of learning achievement of grade 9 students (from 24.7 to 61.6). (Government of Kazakhstan, 2010).

A National Centre for State Standards in Education and Testing (NCSSET), established in 1993, was initially aimed at external assessment of academic achievements of students at entrance exams to higher institutions. Since 2004, external assessment upon graduation from school has been combined with entrance exams to higher institutions, which has been recognized as positive to get a more objective picture of the level of academic proficiency of students. When entering higher institutions on a competitive basis, students are assessed based on their UNT and Entrants Complex Testing (ECT) results. UNT ensures a combination of final state certification of school-leavers and entrance exams to secondary and higher vocational learning institutions. ECT is conducted for graduates of secondary schools, who graduated prior to UNT adoption, for secondary school graduates who studied abroad in the framework of international student exchange, secondary school graduates with Uzbek, Uighur and Tajik languages of training, graduates of music boarding schools as well as those who graduates from foreign institutions. To conduct UNT, in 2004 134 UNT sites were established, and in 2006 their number was 155. They were established in 33 cities and 96 regional centers, taking into account the need to hold exams as close to the location of school leavers as possible. A quarter of school leavers who sat the 2006 UNT showed a level of academic proficiency below the threshold level. (MES, 2008).

## Teaching staff

The reform of the education system within the framework of current socio-economic conditions presents special requirements for the teaching staff. Special attention is therefore paid to the training of teachers, conducted in accordance with State orders. Primary school teachers are trained in teacher colleges and specialist teachers in the different disciplines are trained in universities and higher education institutes. Entrance to teacher education at the university level is based on the results at Unified National Testing, which is narrowly based on school subjects. In 2004, there were 34 higher education institutions and pedagogical colleges offering accredited teacher education following 19 different curricula. In general, teacher training programmes are weakly connected to school practice, and the graduates have not been sufficiently introduced to their future job. As the need for new teachers is growing, the state policy is to offer more grants for free training to new entrants. From 2001 to 2004 the number of grants grew from 5,655 to 6,075. (Government of Kazakhstan, 2005).

The two routes to becoming a qualified preschool teacher are either five years of pre-service training in a pedagogical institute or university, or two or three years of pre-service training in a pedagogical college. Graduates from the former can work in any preschool or tier of secondary school, while those from the latter can work only in preschools or at primary level (i.e. grades 1-4). Out of the preschool workforce, 39% of the staff have higher education degrees (of which 14% have preschool specialist education), and 53% have college diplomas (of whom 41% have preschool specialist education). (Penn, 2004; UNESCO, 2005).



About half of the teachers in both urban and rural schools have higher education. At the same time, 32% of urban teachers and 7% of teachers in rural schools have college qualifications. This indicates that 18% of urban teachers and 42% in rural areas are not properly qualified, which is a serious challenge with regard to ensuring quality education for all. Rural schools are very often small schools with multigrade teaching, for which the teachers do not have sufficient training and experience. The staffing of rural schools remains a problem as many teachers are forced to teach subjects for which they do not have the necessary educational background. (*Ibid.*)

Improving teacher pre-service training is a major task on the way to ensuring quality secondary education for all, as it is directly connected to the quality of learning and education. Especially considering the prospective changes in content regulation from subject knowledge-centered to development of competencies, it is paramount that the necessary thorough changes in teacher education curricula be made as soon as possible.

In-service training is provided by regional in-service training institutes and, for educational administrators, at the central institute in Almaty. There is a requirement that every teacher has to pass regular in-service training every five years. However, the capacity of the institutes is not sufficient: in principle, each year 54,000 teachers should pass the courses, but in 2001 42,784 did so, and 48,157 passed in 2003.

There is a need to increase and enhance the quality of training available for teachers, both at the university level and after graduation. In 2008, student teachers still received little training on teaching methodologies and had little opportunity for practical experience in the classroom. Often this experience is limited to a 4-6 week period of during their final year of school. Anecdotal evidence suggests that many of the student teachers are teaching at levels not suitable for the jobs that they will eventually have (i.e. teaching more advanced students rather than introductory classes). Additionally, teachers often are unable to attend the additional training classes which are required, or must attend these sessions at their own expense. There remains a need to train teachers on new teaching methodologies, particularly given planned changes to the educational system. These training sessions are often desired and requested by teachers and teaching organizations, but it is not always possible to organize such sessions due to the relative lack of methodological experts. This problem is particularly severe outside of Almaty and Astana, and in rural areas. (UNESCO Almaty, 2008).

## References

Government of Kazakhstan; United Nations. *Millennium Development Goals in Kazakhstan. 2005 Report.*

Government of Kazakhstan. United Nations. *Millennium Development Goals in Kazakhstan. 2010.*

INCORVUZ. *Educational profile of the Republic of Kazakhstan.* Document prepared for the International Bureau of Education, December 1998.



Ministry of Education and Science. *On the development of the education system in the Republic of Kazakhstan*. Presented at the 46th session of the International Conference on Education, Geneva, 2001.

Ministry of Education and Science. *Education for All National Action Plan of the Republic of Kazakhstan*. Astana, 2003.

Ministry of Education and Science. *Education for All Mid-Decade Assessment: Reaching the unreached*. Almaty, 2008.

Ministry of Education and Science. *National report on adult education in Kazakhstan*. Astana, March 2008.

Ministry of Education and Science. *Report submitted by the Republic of Kazakhstan as part of the application for membership of the Bologna Process*. Astana, February 2010.

Ministry of Education, Culture and Health. *Basic indicators of the education sector. 1995 through 1998*.

Ministry of Education, Culture and Health. *Basic education plan and its variants for day-time secondary schools*. 1994.

OECD. *Reviews of National Policies for Education. Kazakhstan, Kyrgyz Republic and Tajikistan 2009. Students with special needs and those with disabilities*. Paris, 2009.

OECD and World Bank. *Reviews of National Policies for Education. Higher education in Kazakhstan*. Paris, 2007.

H. Penn. *Childcare and Early Childhood Development Programmes and Policies: Their relationship to eradicating child poverty*. Childhood Policy Research and Policy Center Report No. 8, 2004.

Republic of Kazakhstan. *Education for All 2000 Assessment: country report of the Republic of Kazakhstan*. (Under the co-ordination of R. Zhoumabekova). 1999.

State Committee for Statistics. *Statistical yearbook of Kazakhstan*. 1997.

*State report on education*. 1995, 1996 and 1997.

UNESCO. *Policy Review Report: Early Childhood Care and Education in Kazakhstan*. Early Childhood and Family Policy Series No. 12. Paris, 2005.

UNESCO Almaty Cluster Office. *UNESCO National Education Support Strategy (UNESS) for Kazakhstan*. Almaty, December 2008.



## Web resources

Ministry of Education and Science: <http://www.edu.gov.kz/> [In Kazakh and Russian; some information in English. Last checked: August 2011.]

National Accreditation Center: <http://www.nac.edu.kz/> [In Kazakh and Russian. Last checked: August 2011.]

National Center for Assessment of the Quality of Education: <http://quality.edu.kz/> [In Kazakh and Russian. Last checked: August 2011.]

*For updated links, consult the Web page of the International Bureau of Education of UNESCO: <http://www.ibe.unesco.org/links.htm>*