



Education Reform in the Kyrgyz Republic

- Lessons from PISA

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Key Messages¹

- **The Kyrgyz Republic spends tremendous resources on education - more than 20% of total public expenditure - but outcomes are poor.**
- **The Kyrgyz Republic was ranked last in math, science and reading among nations that participated in the 2006 and 2009 rounds of the Program for International Student Assessment (PISA). The National Sample-Based Achievement Test (NSBA) showed the same trend of underachievement.**
- **A joint World Bank-OECD review was initiated to unlock the major gaps between the educational aspirations of the Kyrgyz Republic and the achievement of reforms in a number of policy areas.**
- **Systemic, sector-wide reforms for reversing the trend of high spending, low impact and poor results were recommended. Reform areas would encompass financing, governance and management of early childhood education; teacher education and development; teacher management, retention and performance; school curriculum and assessment; vocational education and training; and higher education and research.**

Kyrgyz Education: High Spending, Poor Outcomes

The political and social landscape of the Kyrgyz Republic has experienced several upheavals since the country gained independence in 1991. Efforts to establish a new political structure, cope with the changing economic environment, and build a new civic and social order are still underway. These challenges have placed a heavy demand on the financial and human resources of the country and occupied the attention of policy makers.

Despite efforts and considerable spending since independence, the education system has produced mixed results: nearly all students complete basic education but the levels of learning achievement are low. The Kyrgyz Republic was ranked last in math, science and reading among countries that participated in the 2006 and 2009 rounds of the Program for International Student Assessment (PISA). The National Sample-Based Achievement Test (NSBA) showed the same trend of underachievement. Further, high levels of unemployment among secondary school-leavers indicate, in part, a significant mismatch between learning and skills that are in demand in the market.

PISA Results Analysis

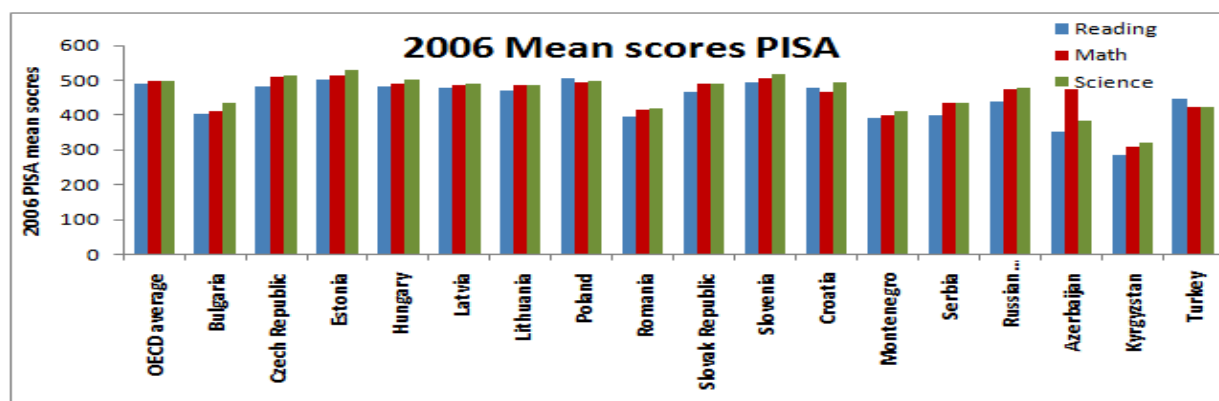
The Organization for Economic Cooperation and Development (OECD) and the World Bank jointly conducted a policy review of education in the Kyrgyz Republic to better understand the reasons for the disappointing performance of Kyrgyz students in the 2006 and 2009 PISA rounds (Figure 1 shows the results of PISA 2006 round). The review sought to unlock the major gaps between the educational aspirations of the country and the achievement of reforms in a number of policy areas.

The school curriculum in the Kyrgyz Republic is inherited from the Soviet era - there is an overload of subjects and hours. Consequently the time available for practical, creative and integrated learning is limited. The curriculum does not allow students to adequately master essential and functional literacy and numeracy. Roughly half of all Kyrgyz students do not have access to usable textbooks. Most textbooks are outdated and poorly designed. Teachers and students have minimal access to other teaching-learning materials.

In addition, the Bank-OECD review highlighted teacher quality and effectiveness of teaching practice as key variables in explaining the poor performance of Kyrgyz students in PISA. Low teacher salaries (60% of the average civil service salary) are a barrier to improving performance. Teachers are not motivated to perform and there are significant barriers to attracting and retaining trainee and young teachers, particularly in remote areas.

¹ This Knowledge Brief is based on the report: "Lessons from PISA - Kyrgyz Republic", OECD and World Bank, 2010.

Figure 1: PISA 2006 Result



Source: OECD-PISA Result 2006

The education system is inefficient: the student-teacher ratio (15:1) is low for the country's level of economic development and the school network has a large number of very small schools. Significant per-student spending variations underlie the disparity in the quality of education - particularly between urban and rural areas, and between Bishkek and the southern regions. The disparity is partly a reflection of the varying levels of local tax revenues and household incomes; there is no adequate compensatory financing mechanism to help equalize the quality of education across the system. There are also urban-rural gaps in the qualification skills of teachers and supply of learning resources - the differences result in disparities in learning achievements.

The functions of the Ministry of Education and Science (MOES) - particularly with respect to strategic planning, budgeting, and monitoring and evaluation - are weak and not goal-oriented. The use of performance information in key Government decision-making processes is limited. There is also a lack of strong accountability structures at school, district and central levels.

World Bank-OECD Review and Recommendations

Reverse the Trend of High Spending, Low Impact and Poor Results

Despite the increased budget allocation and spending on education, the absence of a clear accountability framework and weaknesses in budget management and governance arrangements are causing resources to be spent inefficiently. The MOES does not have insights into the overall spending for the sector and the execution of parts of its own budget. Therefore, its capacity to assess the needs of the system and to monitor reform and implementation results is limited. As a result, the impact of the spending is low and student results are disappointing.

The Bank-OECD review recommends enhancing system accountability and incentives for results by: (i) strengthening school autonomy, with accountability through school performance information to stakeholders and school-based management; (ii) introducing mechanisms for more equitable distribution of resources, such as per student financing, with rationalization of the school network; and (iii) developing capacity in the MOES for the definition and monitoring of policies and quality standards, and for statistics and analysis.

Reform and Expand Early Childhood Education

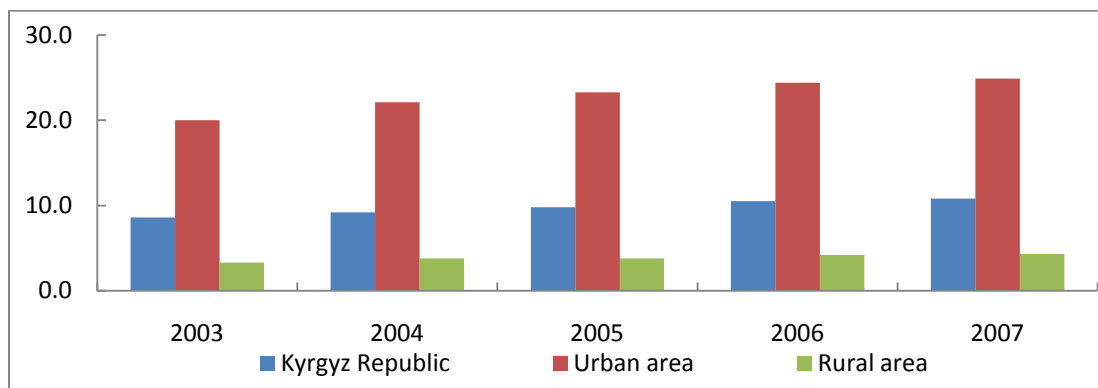
Access to early childhood education (ECD), especially for poor children in rural areas, is difficult in the Kyrgyz Republic (Figure 2). Eager to reverse the trend of declining enrolments in ECD, the Kyrgyz Republic, in 2009, introduced a new law on pre-school education with guidelines for the education and care of young children integrated in the State Standard on Pre-School Education. The successful implementation of these policies will, however, depend on how well the country succeeds in co-coordinating the currently fragmented services for young children and improving the quality of pre-school education.

The Bank-OECD review recommends that policy makers develop a viable financing strategy and implementation arrangements for ECD, revisit the pre-school curriculum to make it more flexible, modernize the pre- and in-service training for pre-school teachers, and ensure adequate pre-school provision in remote rural areas and for disadvantaged children.

Modernize the Structure and Content of the School Curriculum

The present structure and content of the school curriculum impede student achievement and the quality of teaching and learning - there is an overload of subjects and hours,

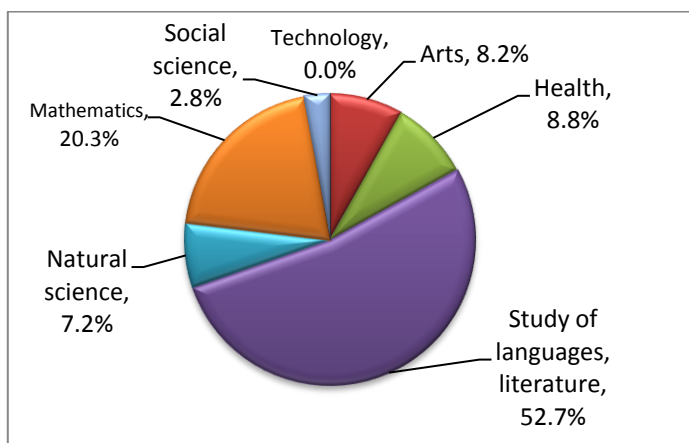
Figure 2: Access to Early Childhood Development



Source: National Statistical Committee

consequently the time available for practical, creative and integrated learning is limited (Figure 3). The conceptual framework of the curriculum is narrowly subject-based and academically-oriented, offering limited choices to the students. The textbooks and learning materials are inadequate to support the curriculum, in short supply and, where available, often out-of-date.

Figure 3: Distribution of Subjects in Curriculum



Source: OECD

The Bank-OECD review recommends introducing a National Curriculum Framework (NCF) to provide a coherent (and cross-subject) view of overall educational objectives for each major stage of education. Schools should have the freedom to adapt parts of the framework to their own needs and the number of subjects should be reduced to allow for more in-depth studying. It is also recommended that a longer-term plan for textbook renewal, reforming the textbook development process, and a revival of the previously existing textbook rental scheme, be formulated. Ideally, the effort would be complemented by a better supply of school libraries with books.

Establish Effective Student Assessment Systems

Student assessment is a regular feature of schooling in the Kyrgyz Republic but assessment tends to focus on the reproduction of content rather than on how well pupils apply, analyze and understand the material. Undue emphasis is placed on coaching the small percentage of high-ability students for success at the academic olympiads, with insufficient attention being provided to average and low-achieving students.

The Bank-OECD review considers it crucial that the Kyrgyz Republic establish standardized educational goals and a standardized assessment system where exam questions are not known in advance and the assessment help build students' self-confidence based on realistic levels of achievement. A policy framework for assessment should be developed to ensure the system is providing information on levels of student learning and achievement; monitoring trends in education quality over time; supporting educators and students for improvement, and holding stakeholders accountable for results.

Ensure Equitable Access and Success for All

About 4% of school-age children do not attend school at all or do not attend regularly. About 30,000 young people discontinue their schooling after basic school and have inadequate skills for the labor market. Children with special educational needs and disabilities have the most difficulty in accessing education.

The quality and availability of data on attendance, transition and school drop-out rates needs to be improved, and training oriented to the labor market provided for early school leavers. Provisions must be made for children with special educational needs and disabilities. Health, education and welfare policies need to be better coordinated with education policies at national, rayon (district) and aiyl-okmotu (community) levels.

Reform Vocational Education and Training

About half of the Kyrgyz population in the age group of 15 to 29 years is unemployed and needs re-training - sustained efforts are required to provide adult education and vocational training. Career information and guidance should be provided. The vocational education strategy needs to be refined to ensure building and upgrading job-relevant skills; fostering innovation and entrepreneurship; and matching supply of skills to demands. It should also incorporate reliable monitoring, transparent reviews, political support, stakeholder consultation, and linkages to economic planning.

Enhance Policies, Incentives and Opportunities for Teacher Management and Development

The teaching career in the Kyrgyz Republic is experiencing major problems which, if not addressed, will undermine other efforts at educational reform. Teacher salaries are 40% below the local market rate. A number of pilot projects, undertaken with donor assistance, hold promise but need to be mainstreamed. Recruitment of high-quality candidates into teaching is inadequate, retaining good teachers in educational institutions is difficult, and the attractiveness of teaching career is low, with women forming the vast majority of the teaching force. Teacher education is provided by a diverse range of institutions that vary greatly in quality. In-service teacher education takes place at regular intervals but needs re-appraisal.

The Bank-OECD review recommends that a comprehensive, coordinated teacher policy be developed for the teaching profession. The teaching force should be smaller but better paid. The licensing and accreditation of teacher education institutions should be conducted by an independent agency. A new framework for pre-service teacher education should be introduced, together with raised entry standards.

Raise the Quality and Relevance of Higher Education

There is a pressing need to modernize higher education in the Kyrgyz Republic so it can respond to the needs of a small economy for educated human capital. The Government has embarked on a program to align higher education with the Bologna Declaration. The Bank-OECD review team recommends the MOES take a leadership role in the development of a national strategy for higher education, addressing the size and efficiency of the sector and ensuring optimal use of resources, including buildings and equipment. The establishment by the MOES of the proposed National Accreditation Council, covering all areas of the post-secondary system, is the most important immediate step towards improving the quality of higher education. However, it is estimated that only about 20% of universities are ready for this kind of quality assurance at the present time. The

existing testing system (**Obsherespublikanskoe Testirovanie** or **ORT**) for selection into higher education should be retained and further strengthened to better reflect student attainment and competencies. The development and introduction of the proposed National Qualifications Framework would greatly facilitate degree recognition and career progression. Higher education institutions should expand their career centers and use employer inputs.

In the area of research, levels of investment are low and there is a lack of coordination among the institutions involved. The research infrastructure is often old or obsolete and there are no resources to replace it. Salaries for scientists and researchers are low. The Bank-OECD review recommends that more funding should be made available for research which should be applied rather than basic.

Conclusion

Education in the Kyrgyz Republic is at a crossroads today. The country has set its sights high in terms of education reform but faces considerable challenges in achieving its goals. The education crisis brought on by low student learning outcomes in PISA could be a window of opportunity for closing achievement gaps with other nations. The joint World Bank-OECD review and its recommendations provide a roadmap for future reforms that need to be systemic, sector-wide and evidence-based, so that the right policies and incentives are in place for ensuring efficient use of resources, clear accountability for performance, and ultimately high quality and equitable educational outcomes for all Kyrgyz citizens. The World Bank is supporting the Kyrgyz Government and working with stakeholders and international partners in implementing these reforms.

About the Author

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