



PRIORITIES ON CAPACITY DEVELOPMENT AND PROPOSALS FOR STRENGTHENING ENGAGEMENT OF REGIONAL STAKEHOLDERS IN IDENTIFYING SKILLS GAPS AND NEEDS IN THE CIS REGION

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Regional Commonwealth in the field of Communications

- Regional Commonwealth in the field of communications (RCC) was established on December 17, 1991 in Moscow by the Communications Administrations of 11 countries: the Azerbaijan Republic, Republic of Armenia, Republic of Belarus, Republic of Kazakhstan, Kyrgyz Republic, Republic of Moldova, Russian Federation, Republic of Tajikistan, Turkmenistan, Republic of Uzbekistan, Ukraine.
- Providing high-quality digital services, improving efficiency, effectiveness, openness, transparency, accountability and curbing corruption in the public administration system, increasing the level of citizen involvement in government and municipal decision-making processes through digital transformation of public and municipal administration system.

Regional Commonwealth in the field of Communications

- On this day the authorized representatives of the Communications Administrations of these countries signed an agreement on the establishment of the Regional Commonwealth in the field of communications — an organization that has been designed to carry out the cooperation of new independent states in the field of electricity (including: networks and means that provide telephone, telegraph communication, data transmission and other kinds of documentary messages, as well as TV, audio and other types of radio and wire broadcasting) and the postal services on a voluntary basis, on principles of mutual respect and sovereignty.
- Today the RCC is an international organization with functions of interstate coordination body of the CIS in the field of telecommunications and postal services, and has observer status in the International Telecommunication Union (ITU) and the Universal Postal Union (UPU), as well as cooperates with international and regional organizations, actively takes part in conferences, forums.
- The RCC structure is composed of 20 members — 12 full members and 8 observers.

Regional Commonwealth in the field of Communications Human Development Council

Main Tasks:

- career planning and training;
- comprehensive staff assessment;
- staging KPI and evaluation of results;
- search and attraction of employees;
- organizational development;
- corporate culture and internal communications.

In most countries of the RCC participants, one of the important areas of personnel policy is to attract promising young managers and specialists to work in the industry, who are able to quickly navigate the constantly changing market environment, boldly implement the latest technologies in production, and apply advanced management techniques.

Regional Commonwealth in the field of Communications Human Development Council

Main Goals:

- proposals on the basics and mechanisms of implementation for the formation of the digital market of the RCC participants' countries;
- institutionalization of the regulation of the safe operation and development of the Internet on the basis of the equal participation of the world community in managing the global network;
- general approaches to the allocation of the radio frequency spectrum for the “Internet of Things” in order to harmonize it and identify priority directions for the development of the “Internet of Things” market in the RCC participants' countries.

ICT/Telecommunication Universities in the Russia



Moscow Technical University of Communications and Informatics (MTUCI) since 1921



Siberian State University of Telecommunications and Information Science



Université d'Etat des télécommunications et de l'infotmation de la région de la Volga(PGUTI)



The Bonch-Bruевич Saint-Petersburg State University of Telecommunications (SPbSUT)

There are more than 110 Universities with Departments “ICT/Telecommunication” in the Russia

State Program “Digital Economy” in the Russia

- The program Digital Economy of the Russian Federation was approved by the Government of the Russian Federation in its resolution No. 1632-r dated July 28, 2017.
- The Sub-commission for digital economy of the governmental commission for the use of information technologies to improve the quality of life and the conditions of doing business was established by the Government of the Russian Federation in its resolution No. 969 dated August 15, 2017, while resolution No. 1739-r dated August 15 approved the members of the Sub-commission for digital economy.
- Resolution of the Government of the Russian Federation No. 1030 dated August 28, 2017 "On the Management System for the Implementation of the program Digital Economy of the Russian Federation" approved the functional structure of the management system for the implementation of the program and the rules for developing and implementing action plans for the implementation of the program

State Program “Digital Economy” in the Russia (approved subprograms)

- Information Infrastructure;
- Human Resources and Education;
- Normative-Legal Regulation;
- Information Security;
- Development of Research Competencies and Technological Reserves.

ITU Centers of Excellence in the CIS



Institute of Electronics and Telecommunications, Kyrgyz Republic



Belarusian State Academy of Communications (BSAT)



The Bonch-Bruевич Saint-Petersburg State University of Telecommunications (SPbSUT)

ITU Centers of Excellence in the CIS (Face-to-Face)

No	Training course topic	CoE	Dates	Venue	Training fee
1	Information Technology Basics	KSTU	April, 15-20, 2019	Bishkek, Kyrgyz Republic	95 USD
2	Fiber-Optic Communication Lines (FOCAL). Modern Instruments and Tools	KSTU	April, 22-26, 2019	Bishkek, Kyrgyz Republic	95 USD
3	Fixed Broadband Access using GPON and GEPON Technologies	BSAT	April, 16-18, 2019	Minsk, Belarus	120 USD
4	Cybersecurity Issues and it Solutions	BSAT	May, 21-23, 2019	Minsk, Belarus	120 USD
5	Computer Literacy	KSTU	May, 13-17, 2019	Bishkek, Kyrgyz Republic	95USD
7	Information Security. Protection of Information and Communication Channels	KSTU	May, 20-24, 2019	Bishkek, Kyrgyz Republic	95 USD
8	Internet of Things and the Digital Economy	SPbSUT	May, 21-22, 2019	St. Petersburg, Russia	300 USD
9	Broadband Technology	KSTU	16-21.09.2019	Bishkek, Kyrgyz Republic	95 USD
10	Digital Literacy	KSTU	21-25.10. 2019	Bishkek, Kyrgyz Republic	95USD
11	Internet of Things and Networks Solutions	SPbSUT	30-31.10. 2019	St. Petersburg, Russia	300 USD
12	Wireless broadband systems quality metrics providing	BSAT	16-18.10 2019	Minsk, Belarus	120 USD
13	Digital Literacy	KSTU	11-16. 2019	Bishkek, Kyrgyz Republic	95 USD
14	Cybersecurity of Web-sites and Web applications	BSAT	13-15.11 2019	Minsk, Belarus	120 USD ¹⁰



PRIORITIES ON CAPACITY DEVELOPMENT IN THE KYRGYZ REPUBLIC 2018-2022

Ainura Sadyrbaeva

Kyrgyzstan adopted strategic documents prioritizing digital transformation for development of the country:

National Development Strategy of the Kyrgyz Republic for the period 2018-2040

Development program of the Government of Kyrgyz Republic for 2018-2022

Action plan of activities for the implementation of the Development Program of the Government of Kyrgyz Republic for the period 2018-2022

“Digital Kyrgyzstan 2019-2023” - The concept of a nationwide digital transformation program

Key priorities of strategic documents:

- Creating new opportunities for the public through the development of digital skills.
- Providing high-quality digital services, improving efficiency, effectiveness, openness, transparency, accountability and curbing corruption in the public administration system, increasing the level of citizen involvement in government and municipal decision-making processes through digital transformation of public and municipal administration system.
- Ensuring economic growth through digital transformation of priority sectors of the economy, strengthening international partnership and the creation of new economic clusters.
- Improving the regulatory framework
- Creating a unified digital infrastructure and platform
- Development of a digital state (digital parliament, digital justice and law and order, digitalization of services)
- Development of the digital economy

Key priorities of strategic documents:

In other words, the digital transformation affects all areas of human activity. But according to the results of the analysis conducted in Kyrgyzstan by the expert group, 60 percent of the population in Kyrgyz Republic is not ready for a digital transformation.

Therefore one of the most important tasks is DEVELOPMENT of DIGITAL SKILLS. In order to rectify the situation it is proposed to train more than one million people.

Following priority areas have been identified for the development of digital skills:

- Introduction of digital education and development of digital skills at all levels of the education system;
- Development of IT-education, large-scale training of high-quality IT-specialists for the IT-industry;
- Developing a system for teaching and retraining digital skills for the entire population, including vulnerable groups;
- Development of national digital content in local languages.

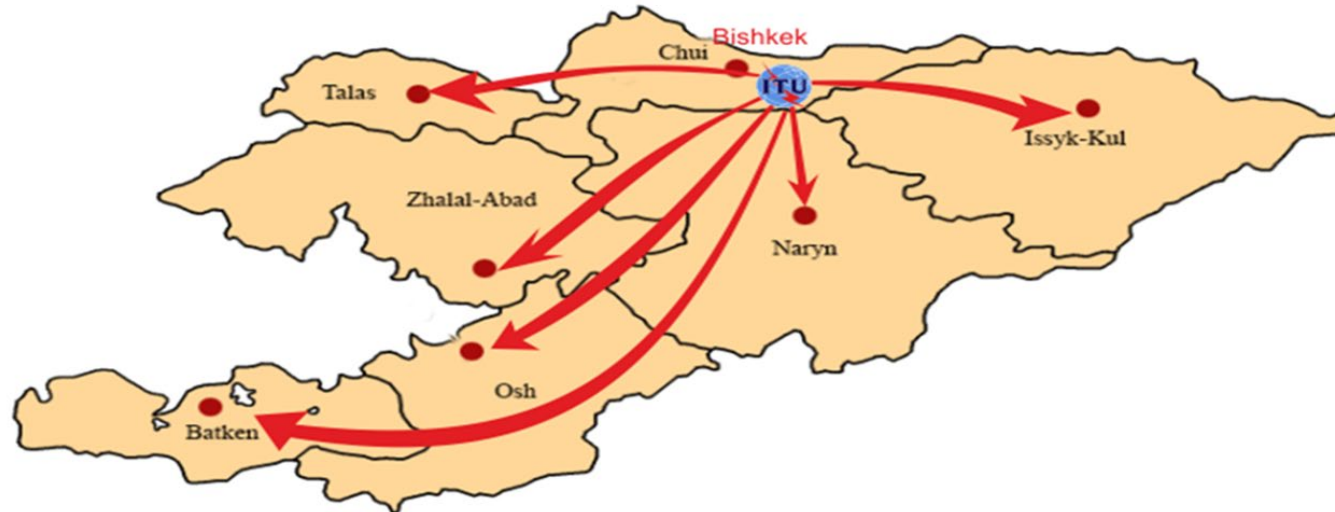
“Smart School” program

At the secondary school level, it was decided to accelerate the implementation of the “Smart School” program, which is a comprehensive program for the introduction of digital technologies in the educational process, which consists of four main components:


- development of IT competence of teachers;
- developing digital skills among students;
- development of digital educational content;
- development of school ICT infrastructure.

Development of IT competence of teachers

It is necessary to note the joint activities of the Administration of Kyrgyz Republic and the Ministry of Education of Kyrgyz Republic. Under this initiative, with the support of ITU, since 2013, free short-term training courses on infocommunication technologies were held for school teachers from remote and rural areas. The first 2 years trainings were conducted only on the basics of ICT. Now trainings developed on 5 topics from the beginning to the advanced level.



Development of IT competence of teachers



650 teachers from rural schools were trained

In total, 35 one-week courses were held.

Including 22 away (exit-) trainings

7 courses are planned in 2019. Expected number of teachers to be trained - 105. The implementation of the “Connect schools” program has a positive effect on the efficiency of using IT in the educational process and the quality of education in general. Such trainings are required at all levels, from schools to government institutions, particularly in remote areas.

Development of school ICT infrastructure and development of digital educational content

- 30 innovative schools were equipped last year with modern computers (latest generation computers, multifunctional devices, server equipment, interactive whiteboards and video conferencing system).
- These innovative schools were created as part of the implementation of Presidential Decree on development of regions for testing e-learning, piloting the introduction of multimedia and electronic technologies in the educational process.

Development of school ICT infrastructure and development of digital educational content



innovative schools

Development of school ICT infrastructure and development of digital educational content

Two multimedia products are already being used in schools:

1. iBilim (<http://www.ibilim.kg/rus/>) and
2. Bilim Bulagy (<http://bilimbulagy.kg>)



People with special needs

The following category of citizens such as:

- Women
- PWD,
- youth
- elderly people

also need digital skills training in order to use digital technologies to expand their socio-economic rights and opportunities.

The main part of this category of citizens currently do not have access to the online environment. Providing them with appropriate skills, digital technologies open up new opportunities for the inclusion of vulnerable groups in the country's development processes.

People with special needs who have acquired skills in working with ICT tools can use the potential of ICT in searching job, entrepreneurship and lifelong learning. This is particularly relevant in the context of youth unemployment and existing gender gap in the development of skills working with ICT tools.

People with special needs



Considerable work was carried out together with ITU.

Training and Resource Center for People with Disabilities was established in Kyrgyzstan in 2014.

Short-term computer trainings on information technologies are conducted for persons with disabilities, both in groups and individually on specially equipped workplaces/computers.

Also inclusive education is practiced.

People with special needs



With the assistance of UNESCO with the involvement of specialists from the UK and Russia, a series of trainings and round tables were held on the application of methods for teaching people with disabilities how to use telecommunication / ICT facilities and adaptive technologies.

WOMEN AND GIRLS GENDER GAP

- Women significantly lag behind men in the labor market in the Kyrgyz Republic: only about 48% of women (as compared to 76% of men) are economically active in the country, according to the National Statistics Committee (NSC). This gap between male and female participation in the workforce of the Kyrgyz Republic continues to grow. Women comprised only 40% of the Kyrgyz workforce in 2015, compared with 44% in 1990.
- Women's employment is concentrated in relatively low paid sectors such as, education and health and less in sectors such as, transport or mining. As for employment in the ICT sector, men dominate: the share of females stands at 28.1% as compared to 71.9% for men, although interestingly, 45.5% of all graduates from tertiary courses in computer science, which often tends to be a male-dominated field of study, are female (SNC 2016). It is also of note that women earn 25.6% less than men when their average monthly salaries are compared.

WOMEN AND GIRLS



- **Girls in ICT Day has been organized since 2012 in Kyrgyzstan.**
- **The main goal of this event was to recruit girls and young women in ICT sector.**

WOMEN AND GIRLS



- We organize round tables and trainings, where successful women in the field of ICT share their experiences with girls.



WOMEN AND GIRLS

- Every year we announce various contests.
- Our partners - ICT organizations help with awards to winners.



WOMEN AND GIRLS



We face the following problems in implementing digital transformation programs:

- Lack of state funding for digital transformation and digitalization of government programs and projects
- Lack of specialists with necessary qualifications for implementation of projects on digital transformation
- Citizen still mistrust digital technology and e-services
- Low digital literacy rates, especially in remote and rural areas, which can make it difficult to use online services

In particular, gaps and problems in digital skills:

- Underdevelopment of mechanisms for the system study of new training and retraining needs of specialists, taking into account rapidly developing technologies and their capabilities
- The limitations and inflexibility of educational and training programs and courses for digital development
- Lack of tools for regular monitoring and evaluation of the effectiveness and relevance of training programs and courses
- Undeveloped system for digital skills training

Gaps and problems in digital skills:

- Underdevelopment of motivational mechanisms for retaining talented specialists
- Inconsistency and poor coordination of educational institutions and organizations in development and provision of training programs and courses
- Underdeveloped mechanisms for engaging the business sector in the process of studying market needs and training IT specialists
- Lack of well-established practice of interaction between academic institutions and business companies for the preparation of practical digital skills
- Availability of government programs and scholarships to study at world top universities

What to do?

- Create a sustainable system of training, development and retention of talented professionals for the development of digital innovations that are in demand not only in local but also in regional and global markets.
- To educate the public on the effective use of new digital technology opportunities, both for obtaining services and doing business, as well as learning cybersecurity skills and protecting personal data
- Develop a network of digital competence centers through cooperation with educational institutions, non-profit organizations and business associations.
- To interest the private sector to acquire practical digital skills through participation in project implementation, as well as conducting educational activities and trainings for the public.

What to do?

- Take effective measures to prevent the brain drain from the country and attract qualified experts from other countries.
- Develop effective incentives for IT specialists in public service, including support for professional development and access to global knowledge, scholarships and participation in competitions.
- Improve educational approaches in educational institutions when preparing digital leaders in public service by regular workshops, internships and international best practices exchanging through cooperation with other countries.

THANK YOU FOR YOUR ATTENTION!!

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