

DIGITALIZATION OF EDUCATION AND LEGAL GUARANTEES OF QUALITY

Zhumagulova A.B.*¹¹Independent Agency for Accreditation and Rating, Astana, Kazakhstan

ABSTRACT. The article is devoted to the legal aspects of digitalisation of education in Kazakhstan, in which an analysis of approaches to ensuring the quality of education in the context of digital transformation is conducted.

Particular attention is paid to the legal framework for ensuring the safety of students within the framework of a comparative analysis of the legislative regulation of the digital process in the Republic of Kazakhstan. The article examines the legal guarantee of the quality of digital education in the country and provides a comparative analysis of legal regulation.

The purpose of this article is to assess the legal aspects of digitalisation of education by identifying bottlenecks in legal support for quality education. This highlights the importance of ensuring quality education and helps improve the competitiveness of graduates in the labour market. The main objectives of the article are to deeply understand the impact of digital technologies on the quality of education, to study legal support as a guarantee of the quality of training specialists, and to assess the mechanisms and legal support for the quality of education in the context of digital transformation.

Of scientific interest is the study of digital changes occurring in the educational process from the point of view of ensuring the quality of graduate training, along with the extent to which issues of digital learning are enshrined in law.

The methodology of the article is based on a systematic study of the theoretical and practical foundations of legal regulation, determining the impact of IT technologies on ensuring the quality of education.

The article utilised general scientific research methods: comparisons, generalisations, observations of changes, analysis and external evaluation, and empirical analysis.

KEYWORDS: digitalisation, quality of education, digital learning, external evaluation, legal guarantees, jurisprudence, digital technologies, IT technologies.

Цифровизация образования и правовые гарантии качества

Жумагулова А.Б.¹¹Независимое агентство аккредитации и рейтинга, Астана, Казахстан

АННОТАЦИЯ. Статья посвящена правовым аспектам цифровизации образования в Казахстане, в которой проведен анализ подходов к обеспечению качества образования в условиях цифровой трансформации.

Отдельное внимание уделено правовым основам обеспечения безопасности обучающихся в рамках сравнительного анализа законодательного регулирования цифрового процесса в Республике Казахстан. В статье рассмотрены вопросы правовой гарантии качества цифрового образования в стране и проведен сравнительный анализ правового регулирования.

Цель статьи заключается в оценке правовых аспектов цифровизации образования на основе определения «узких мест» правового обеспечения качества обучения. Это актуализирует вопросы обеспечения качества образования и помогает повысить конкурентоспособность выпускников на рынке труда.

Основные задачи статьи заключаются в глубоком осмыслении влияния цифровых технологий на качество обучения, в изучении правового обеспечения как гарантии качества подготовки специалистов в оценке механизмов и правового обеспечения качества образования в условиях цифровых преобразований.

Научный интерес представляет изучение цифровых изменений, происходящих в образовательном процессе с точки зрения обеспечения качества подготовки выпускников, вместе с этим, насколько законодательно закреплены вопросы цифрового обучения.

Методология статьи базируется на системном изучении теоретических и практических основ нормативно-правового регулирования, определении влияния IT-технологий на обеспечение качества образования.

В статье использовались общенаучные методы исследования: сравнений, обобщения и наблюдения изменений, анализ и внешняя оценка, эмпирический анализ.

КЛЮЧЕВЫЕ СЛОВА: цифровизация, качество обучения, цифровое образование, внешняя оценка, правовые гарантии, правоведение, цифровые технологии, IT-технологии.

Білім беруді цифрландыру және заңдық сапасының кепілдері

Жұмағұлова А.Б.¹¹Аккредиттеу және рейтингтің тәуелсіз агенттігі, Астана, Қазақстан

АНДАТПА. Мақала Қазақстандағы білім беруді цифрландырудың құқықтық аспектілеріне арналған, онда цифрлық трансформация жағдайында білім сапасын қамтамасыз ету тәсілдеріне талдау жүргізіледі.

Қазақстан Республикасындағы цифрлық үдерісті заңнамалық реттеуді салыстырмалы талдау шеңберінде студенттердің қауіпсіздігін қамтамасыз етудің құқықтық негіздеріне ерекше назар аударылады. Мақалада еліміздегі цифрлық білім беру сапасының құқықтық кепілдігі қарастырылып, құқықтық реттеудің салыстырмалы талдауы қарастырылған.

Мақаланың мақсаты – сапалы білім беруді құқықтық қамтамасыз етудегі «тар жолдарды» анықтау негізінде білім беруді цифрландырудың құқықтық аспектілерін бағалау. Бұл білім сапасын қамтамасыз ету мәселесін алдыңғы қатарға шығарып, түлектердің еңбек нарығындағы бәсекеге қабілеттілігін арттыруға септігін тигізеді.

Мақаланың негізгі мақсаттары – цифрлық технологиялардың білім сапасына әсерін терең түсіну, цифрлық трансформациялар жағдайында білім беру сапасын құқықтық қамтамасыз ету мен тетіктерді бағалауда мамандарды дайындау сапасының кепілі ретінде құқықтық қолдауды зерделеу.

Білім беру үдерісінде болып жатқан цифрлық өзгерістерді, цифрлық оқыту мәселелерінің қаншалықты заңмен бекітілгендігімен қатар, бітірушілерді даярлау сапасын қамтамасыз ету тұрғысынан зерттеу ғылыми қызығушылық тудырады.

Мақаланың әдістемесі құқықтық реттеудің теориялық және практикалық негіздерін жүйелі зерттеуге, IT-технологиялардың білім сапасын қамтамасыз етуге әсерін анықтауға негізделген.

Мақалада жалпы ғылыми зерттеу әдістері қолданылды: салыстыру, өзгерістерді қорыту және бақылау, талдау және сыртқы бағалау, эмпирикалық талдау.

ТҮЙІН СӨЗДЕР: цифрландыру, білім сапасы, сыртқы бағалау, цифрлық оқыту, құқықтық кепілдіктер, құқықтану, цифрлық технологиялар, IT технологиялар.

INTRODUCTION. Digitalisation of educational activities is an important area of state policy in the Republic. Today, Kazakhstan is implementing the state program "Digital Kazakhstan" [1]. Digital transformation is a priority area of Kazakhstan's state policy, which is aimed at improving the quality and competitiveness of the country's education system. The introduction of IT technologies into education expands the forms and methods of teaching and provides broad access to educational resources.

In the context of digital transformation, legal guarantees of quality education and approaches to ensuring them play an important role. Article 30 of the Constitution of the Republic of Kazakhstan defines the right to education, which is one of the fundamental social rights of a person [2]. Ensuring this right presupposes access to quality educational programs and compliance with international standards for obtaining a high-quality education. The introduction of digitalisation in education is the process of introducing IT technologies into teaching, controlling the educational process, and external audit of the results of educational activities.

Digitalisation contributes to the expansion of accessibility to education, the development of internationalisation and academic mobility of students and faculty. In turn, the educational process raises legal risks that are directly related to improving the education quality, the security of personal data, and the academic rights of students.

The Law of the Republic of Kazakhstan "On Education" establishes the possibility of using the online format based on distance learning in the implementation of educational programs [3]. However, from a legal perspective, there is no definition of digitalisation of education. Therefore, this requires a thorough understanding of the concept of "digitalisation of education."

In the context of digital transformation, education quality indicators are supplemented by the following criteria: digital infrastructure, quality of digital educational resources, and the level of digital competence of teaching staff. However, to date, these criteria are not reflected in regulatory and legal acts.

The quality of education, as an object of legal regulation in the Republic of Kazakhstan, is considered through the compliance of the educational process and learning outcomes with the state compulsory educational standards (SCES) and international ESG standards. Ensuring the quality of education is an important task of the state policy of quality assurance in the education field [4]

State Compulsory Standards establish uniform requirements for learning outcomes regardless of the form of implementation of educational programs [5]. This ensures formal equality between traditional and digital learning formats. However, it does not take into account the specifics of the digital educational environment.

Digital education is an integral part of the modern educational space, which encompasses secondary, technical and vocational education, and higher education. Legal regulation in this system is a very complex and multifaceted process. In this case, it is necessary to take into account both technological and pedagogical issues. In this article, we will examine key areas and approaches to regulating digital education and assess current challenges and prospects.

MATERIALS AND METHODS OF RESEARCH. Legal support for the quality of digital education is a system of legal instruments and mechanisms for complying with requirements for the educational process within the framework of the legal protection of students. These may include: licensing, accreditation of educational organisations and educational programs, state preventive inspections of educational institutions, as well as legal protec-

tion mechanisms.

State preventive control of the quality of education is carried out by authorised bodies, which is aimed at ensuring that the educational process complies with the requirements of legislation and standards [6]. At the same time, there are no special procedures for assessing the quality of digital educational technologies, which reduces the effectiveness of control. Today, the assessment of the quality of digital technologies in education is still underdeveloped. However, all students have the right to receive a quality education and protection of their interests in connection with their violations. The laws of the Republic of Kazakhstan provide for the possibility of appealing to authorised bodies and legal authorities. However, there are practices associated with poor-quality distance education. The regulatory legislation of the Republic of Kazakhstan enshrines the right of students to a guaranteed quality education and ensures the protection of these rights. However, legal practice on issues related to poor-quality distance education remains limited. This is due to the difficulty of proving the poor quality of educational services. This depends on the difficulty of proving the low quality of educational services.

A comparative analysis of legislative regulation of digital education reveals that in Kazakhstan, it is more general in nature and requires further elaboration based on international experience. Thus, as an example, in Russia, digitalisation of education is legislatively enshrined in the Law of the Russian Federation "On Education", which defines the possibility of using e-learning and distance IT technologies [7]. In Russia, regulations have been developed that define the procedures for implementing digital educational programs. In the European Higher Education Area, digitalisation is presented within the framework of quality assurance and academic integrity.

The European Quality Standards for Higher Education (ESG) provide for mandatory internal and external quality control of educational programmes, including digital learning formats [8].

One of the main problems is the lack of specific criteria for the quality of digital education, as well as regulations for the use of IT technologies and the insufficient development of legal protection tools for students.

An important step in the development of legislation is the development of special regulations and requirements for digital education. It is necessary to improve the State Compulsory Standard taking into account digital learning formats and harmonise national legislation with international approaches. In the Republic of Kazakhstan, an important issue in the legal regulation of digitalisation of education is the lack of specifically defined criteria for the quality of digital education, as well as the lack of regulations for the use of digital technologies. The risks of violating students' rights should be considered separately.

Based on the conducted monitoring of existing legislation, we are able to identify certain issues related to digitalisation within the framework of legal regulation of education. First of all, there is a lack of specific criteria for the quality of digital education, a lack of regulations for the use of modern IT technologies and artificial intelligence, and, most importantly, a lack of mechanisms to protect the rights of students.

An important area of legal regulation is the development of legislative requirements for the development of digital education, taking into account the provision of quality criteria and indicator assessments. In this regard, when developing standards, it is necessary to take into account digital forms of education and the development of a legislative framework to ensure the protection of students' rights.

RESULTS AND THEIR DISCUSSION. According to the Rules for organising the learning process for distance learning and online learning in higher and/or postgraduate education programs, they were put into effect by Order No. 397 of the Minister of Science and Higher Education of the Republic of Kazakhstan dated 07.08.2023. The Law of the Republic of Kazakhstan "On Education", paragraph 13 of Article 5-3 and paragraph 15 of the Regulation on the Ministry of Higher Education of the Republic of Kazakhstan, in accordance with the Decree of the Government of the Republic of Kazakhstan dated August 19, 2022 No. 580 "On certain issues of the Ministry of Science and Higher Education of the Republic of Kazakhstan" define the procedure for the educational process for digital and online learning in educational programs of higher and postgraduate education

Table 1. The system of concepts of digital learning

№	Concept	Characteristic
1.	Asynchronous learning format	Distance learning (online), based on digital systems not connected to place and time
2.	Digital system	A set of IT technologies and methods for teaching students
3.	Online learning	A form of education in areas of training in which a student receives higher and/or postgraduate education based on information and communication technologies and the Internet, regardless of spatial and temporal distance
4.	Online proctoring	A system for verifying identity and confirming online exam results, ensuring recording, recognition and identification of individuals, multifactor recognition, and logging of suspicious events
5.	Synchronous learning format	Online, involves direct connection (streaming) of students in real time, using digital capabilities
6.	Information and communication technologies	A set of methods with electronic information resources and methods of information interaction between a software package and a telecommunications network
7.	Massive open online course (MOOC)	A training course with mass interactive participation, using e-learning technologies and open access via the Internet
8.	Educational portal	An information system designed for the educational process to digital resources and educational services using an information and telecommunications network
9.	Digital educational resources (DER)	Module material that provides an interactive learning process and digital learning materials

The Rules for Distance Learning and Online Learning in Higher and Postgraduate Educational Programs use the following concepts: asynchronous learning format; digital system; online learning; online proctoring; synchronous learning format; information and communication technologies; massive open online course (hereinafter referred to as MOOC); educational portal; digital educational resources. Table 1 presents the characteristics of the digital learning categories.

In Kazakhstan, online education is available, but with

restrictions: digital learning is available for obtaining a second higher education, for college graduates, and for medical reasons, as well as for schoolchildren and students, where it is integrated into educational programs (up to 50%) or fully implemented for certain categories. For example, in IT programs at certain universities. There are still few licensed universities offering full-fledged digital higher education with a state-recognised diploma. However, many are preparing for this.

The digitalisation of higher and further education is aimed at transforming both the educational process itself and its organisational structures. Digital learning is particularly relevant for universities, as competition to recruit the best students and faculty increases, and university graduates are required to be able to apply digital technologies in practice. Distance learning has great potential for use in the educational environment. According to the Ministry of Science and Higher Education's 2024 monitoring of the implementation of distance and online learning in Kazakhstan's universities, distance learning was implemented in 52 higher and postgraduate education institutions in the Republic of Kazakhstan, accounting for 48% of the total number of students enrolled in higher education. Certain universities, such as art or medical universities, cannot implement distance learning.

Thus, prospects for the development of legal regulation of digital education are associated with the following areas:

Firstly, with the integration of digital technologies – the formation of hybrid learning models that include traditional and digital learning methods.

Secondly, with the improvement of legislation – the adaptation of the legal framework based on the introduction of modern IT technologies and new forms of education.

Thirdly, with the expansion of participation of all stakeholders – the involvement of faculty, students, and all stakeholders in the regulatory process of decision-making.

An analysis of digital education regulation shows that this is a dynamic and complex area that requires constant attention from the government, educational institutions, and society as a whole.

Effective regulation can significantly improve the education quality and ensure equal access to it for all segments of the population. It is important to continue to explore and adapt regulatory approaches to meet the challenges and opportunities presented by digitalisation.

CONCLUSION. Thus, digitalisation is an objective and important process aimed at transforming the education system. Digitalisation of education in Kazakhstan is an important factor in modernising the education system and increasing its competitiveness. At the same time, the effective implementation of digital technologies is impossible without adequate legal support for the quality of education.

The implementation of IT technologies is possible in the presence of a developed system of legal guarantees for the quality of education. For the development of digital education in the Republic of Kazakhstan, current legislation creates a foundation for legal conditions, but further development and improvement are necessary.

The formation of a system of legal guarantees for the quality of digital education is a necessary condition for the implementation of the legislative right to education and the sustainable development of the educational system, according to the Constitution of the Republic of Kazakhstan.

Improving legislative regulation of digital education technologies should be aimed at ensuring a balance between innovation and the protection of the right to qual-

ity education, as well as taking into account best international practices. Digital learning is a promising way to obtain education.

The creation of an effective IT education system increases the accessibility of quality education for students, develops digital skills, and improves the quality of learning through the use of modern innovative technologies, electronic libraries, and more.

Digital learning makes universities more attractive in the international educational market, including for international students, and reduces infrastructure maintenance costs.

Digital learning will also enable the training of the next generation using artificial intelligence and virtual reality and will provide impetus for the development of modern digital education in the country.

REFERENCES:

1. Gosudarstvennaya programma «Cifrovoy Kazakhstan» (2017). [State Program "Digital Kazakhstan"]. Approved by the Resolution of the Government of the Republic of Kazakhstan No. 827 of December 12, 2017. Astana. [In Russian].
2. Konstitucija Respubliki Kazakhstan (prinjata na respublikanskom referendumе 30 avgusta 1995 goda) [Constitution of the Republic of Kazakhstan (adopted at the republican referendum on August 30, 1995)] / IS Paragraf [IS Paragraph]. Available at: URL: <http://online.zakon.kz> [In Russian]. (accessed: 11.11.2024).
3. Zakon Respubliki Kazakhstan «Ob obrazovanii» (2007). [Law of the Republic of Kazakhstan "On Education"] No. 319-III of July 27, 2007. [In Russian].
4. Standards and Guidelines for Quality Assurance in the European Higher Education Area (ESG) (2015). Brussels. [In English].
5. Gosudarstvennye obscheobjazatel'nye standarty obrazovanija Respubliki Kazakhstan [State Compulsory Standards of Education of the Republic of Kazakhstan]. [In Russian].
6. Bajmahanov, M.T. Konstitucionnye prava i svobody cheloveka v Respublike Kazakhstan [Constitutional rights and freedoms of a person in the Republic of Kazakhstan]. Almaty. [In Russian].
7. Federal'nyj zakon Rossijskoj Federacii «Ob obrazovanii v Rossijskoj Federacii» [Federal Law of the Russian Federation "On Education in the Russian Federation"]. [In Russian].
8. Sulejmenov, M.K. Pravo na obrazovanie v Respublike Kazakhstan: teorija i praktika [The right to education in the Republic of Kazakhstan: theory and practice]. [In Russian].
9. Abdrasilov, E.B. Cifrovizacija obrazovanija: pravovye aspekty [Digitalization of education: legal aspects]. Vestnik vysshej shkoly Kazahstana [Bulletin of the Higher School of Kazakhstan]. [In Russian].
10. Zhumagulova, A. & Yanovskaya, O. (2025). New paradigm for ensuring the quality of education. Education. Quality Assurance, 3(36), 9–16. [In English].

AUTHOR INFORMATION:

Жумагулова Алина Бакытжановна - кандидат юридических наук, генеральный директор Независимого агентства аккредитации и рейтинга (IAAR), г. Астана, Республика Казахстан. E-mail: iaar@iaar.kz

Жұмағұлова Алина Бақытжанқызы - заң ғылымдарының кандидаты, бас директор, Аккредиттеу және рейтинг тәуелсіз агенттігі (IAAR), Астана қ., Қазақстан Республикасы. E-mail: iaar@iaar.kz

Zhumagulova Alina - Candidate of Juridical Sciences, General Director, Independent Agency for Accreditation and Rating (IAAR), Astana, Republic of Kazakhstan. E-mail: iaar@iaar.kz

МРНТИ 14.29
УДК 331.101.262

DOI 10.58319/26170493_2026_2_10

АКТУАЛИЗАЦИЯ ТЕОРИИ И ПРАКТИКИ НЕГЛАСНЫХ СЛЕДСТВЕННЫХ ДЕЙСТВИЙ В СТРАНАХ ЦЕНТРАЛЬНОЙ АЗИИ

Рахматджонзода Р.Р.^{1*}, Рахметов Э.С.¹

¹Академия МВД Республики Таджикистан, Душанбе, Республика Таджикистан

АННОТАЦИЯ. В данной статье, авторами указывается на актуализацию теории и практики негласных следственных действий в странах Центральноазиатского региона. Рассматривая различные позиции авторов, ученых, практиков, а также достаточное количество научных и иных источников, авторы приходят к мысли о том, что использование возможностей негласных следственных действий в раскрытии и расследовании преступлений является в настоящее время сближающим компонентом между негласной и гласной деятельностью правоохранительных органов. Позиции государств Центральноазиатского региона имеют ряд особенностей, но вместе с тем, имеются наработки при дальнейшем сочетании и внедрении негласных следственных действий в уголовное судопроизводство.

КЛЮЧЕВЫЕ СЛОВА. негласные следственные действия, следственные действия, оперативно-розыскные мероприятия, оперативно-розыскная деятельность, теория, практика, инновации, цифровизация, преступность.

Орталық Азия елдеріндегі жасырын тергеу әрекеттері теориясы мен практикасының өзектендірілуі

Рахматджонзода Р.Р.^{1*}, Рахметов Э.С.¹

¹Тажикстан Республикасы Ішкі істер министрлігінің академиясы, Душанбе, Тажикстан Республикасы

АНДАТПА. Осы мақалада авторлар Орталық Азия өңірі елдеріндегі жасырын тергеу әрекеттерінің теориясы мен практикасының өзектілігін қарастырады. Авторлар әртүрлі ғалымдардың, практик мамандардың көзқарастарын, сондай-ақ көптеген ғылыми және өзге де дереккөздерді талдай отырып, қылмыстарды ашу және тергеп-тексеру барысында жасырын тергеу әрекеттерінің мүмкіндіктерін пайдалану қазіргі уақытта құқық қорғау органдарының жасырын және жария қызметі арасындағы өзара жақындастырушы тетікке айналған деген қорытындыға келеді. Орталық Азия өңірі мемлекеттерінің ұстанымдары бірқатар ерекшеліктерге ие болғанымен, жасырын тергеу әрекеттерін қылмыстық сот ісін жүргізуге одан әрі ұштастыру және енгізу бағытында жинақталған тәжірибе де бар.

ТҮЙІН СӨЗДЕР: жасырын тергеу әрекеттері, тергеу әрекеттері, жедел-іздістіру іс-шаралары, жедел-іздістіру қызметі, теория, практика, инновациялар, цифрландыру, қылмыс.

Updating the theory and practice of covert investigative actions in the countries of Central Asia

Rakhmadzhonzoda R.R.^{1*}, Rakhmetov E.S.¹

¹Academy of the Ministry of Internal Affairs of the Republic of Tajikistan, Dushanbe, Republic of Tajikistan