

**GCPMED 2020**  
**Global Challenges and Prospects of the Modern Economic**  
**Development**

**MUNICIPAL GOVERNANCE IN THE DIGITAL ECONOMY:**  
**LEGAL ASPECT**

A. G. Khabibullin (a)\*, V. K. Barchukov (b), A. A. Petrogradskaya (c)

\*Corresponding author

(a) Moscow State University, Sparrow hills, 1, Moscow, Russia, 21alikh@mail.ru

(b) Moscow State University, Sparrow hills, 1, Moscow, Russia, barchukov-vk@mail.ru

(c) Samara State University of Economics, Soviet army Str., 141, Samara, Russia, petrogradckaya@yandex.ru

**Abstract**

In this research the author focuses on IT novelties and the way they affect the routine of local governments. That analysis is based on the practical overview of paramount influence of digital economy tools on local governments work. The main regulative acts on the digitalization process in Russia are studied along the importance of information technology regarding expanding country's competitiveness in international political relations. The article notes that digital economy positively impacts mundane activities in all social spheres, including the activities of municipal authorities. Therefore, the efficiency of local government bodies is mostly dependent on the active and effective exploitation of novel communication skills and technological advances in their activities. The study attempts to build an understanding of a new aspect of homeland legal system - "Electronic municipality". E-municipality is basically a system of "paperless" technologies used in the activities of municipal bodies through electronic document management and business management systems. It is obvious that such form of organizing the activities of local self-government bodies plays a crucial role in increasing the level of digitalization and results in increasing the efficiency of their activities. To expatiate on the aforementioned issues the research covers advantages of e-municipality, its execution in different regions of Russia. The author notes key problems that urge immediate response. The author sees the solution to most of the issues in improving the local regulatory framework for the digitalization of municipal management.

2357-1330 © 2021 Published by European Publisher.

*Keywords:* Digital economy, electronic municipality, information technology, legal regulation, municipal government



## **1. Introduction**

The entire world is now in the middle of digital skill tech revolution. According to World Bank data, digital technology has spread rapidly to most countries in the world. As much as 55% of all the people in the world are able to access the Internet rather freely. Global markets suffer significant changes under the influence of modern information technologies: many traditional industries lose their importance in the world economy due to the rapid growth of new sectors that provide digital dividends. Intensive development of information technologies and build-up of the digital economy are the most important conditions for ensuring the long-term competitive advantages of our country in international relations. Modern digital technologies affect all spheres of life, including the communication system of the government. In this regard, it is relevant and beneficial to research the paramount outcomes of IT and modern communication skills use in municipal governance.

## **2. Problem Statement**

The issues of the digital technologies development in regard of local governments are the focus of attention for many researchers. Successful digitalization of municipal governments and the way it is carried out mark the relevance of this research as it currently is priority of state policy. The President set plan in 2018 to ensure that in 6 years most of all state and municipal services are remotely accessible in real time through online services. State must also attempt to digitize the workflow between government agencies as he addressed Federal Council (Message of the President of the Russian Federation to the Federal Assembly of 2018).

## **3. Research Questions**

Undoubtedly, the use of new electronic platforms and digital technologies creates basis for the transformation of the functions of municipal government, the development of institutional forms that allow for more effective interaction between municipal government bodies and citizens. However, the successful implementation of this program is only possible if a consensus is reached in defining the strategic goals of the model of socio-economic development chosen by society, based on a fundamental understanding of state, private and social missions and obligations. In this regard, the concept of digital transformation of municipal government institutions requires comprehension and development of new basic provisions.

Relevance and novelty of the study are reflected in the unicity and objectivity of the analysis that is done on the issues of modern national system of municipal administration digitalization. The research of legislation and legal policy on the activities of the municipal administration reveal several problems that need to be urgently attended. The success of IT and communication skills use in the field of municipal management is reached through everlasting evolution of such tech novelties and regulatory framework, that ought to be developed in harmony with the specific conditions for the development and functioning of a particular subdivision of the Russian Federation.

#### **4. Purpose of the Study**

This research focuses on key notes of legislation and legal policy on the processes of digitalization of municipal management. The objective is reached through understanding of the necessity to track how Russian legislation has developed regarding this area. The main advantages of the digital economy, its positive impact on various spheres of life in modern society, including municipal governance are also implied. State system seeks advancement through constructing "e-government" in Russia, and the "electronic municipality" is called upon to become an analogue of "electronic government" at the local level. An e-municipality presumes the introduction of "paperless" technologies into the activities of municipal bodies and officials through electronic document and business systems. Obviously, this form of organizing the activities of local government bodies plays a crucial role in increasing the level of digitalization and, as a result, in increasing the efficiency of local governments work. The main advantages of e-municipality and the issues connected to the way it emerges and is used in Russia are also subject to research.

#### **5. Research Methods**

Philosophical and general scientific principles (objectivity, consistency, comprehensiveness, unity of theory and practice) are the main methodological nubs of the research. Methodological approaches outlined in the works of scientists that study and analyze the problems of the digital economy of municipal governments, its initiation and functioning are widely used in this study too. The most important method for analyzing legal problems is the analysis of regulatory legal acts and scientific literature on the research topic. Also, to complete the article, the author used methods of cognition, such as: dialectical, systemic, logical, and those arising from general specific scientific methods: concrete historical, comparative legal, logical legal, etc. In addition to the listed methods, the author implemented formal legal method. The validity of the conclusions of the article is achieved through the complex application of the method of describing concepts, the method of interpretation. In addition, formal logic, analysis, synthesis and other methods are used in the paper.

#### **6. Findings**

The speedy instigation of information technologies is a relatively recent phenomenon for Russia, starting from the end of the XXth century. Consequently legislation on it is rather new and therefore constantly updated. One of the first documents in the analyzed area is the Concept of State Information Policy, created in 1988. It was this document that set out the strategic base for digitalization policy and outlined goals, which are subsequently used as guidelines.

The issue of a conceptual legal document on legal digitalization followed the aforementioned event quite shortly, in 1993 (Federal Law of 28 June 1993 N 966-FZ). The purpose of this Decree was to solve two problems. First, the development of a legal framework for informatization of society, which includes state policy on IT tech development. Secondly, to emerge projects on the coordination and rational use of available resources and opportunities, which could maximally meet the needs of not only citizens, but also government agencies.

The next stage of development was revealed as the plan was set to widen digitalization and it was expounded in a program document setting strategy keynotes up to 2019 (Federal Law of 3 February 2019 N 234-FZ). As part of the implementation of this state initiative, attention was focused on such strategic points as:

- technical policy advancement;
- information technologies integration into the work of state and municipal employees, approbation of research results;
- increasing the scope of information programs;
- promoting the competitiveness of software;
- raising the status of national digital community.

Okinawa Charter on Global Information Society, adopted on 22 July was signed in summer of 2000 at the summit of G8 leaders (Okinawa Charter of the Global Information Society, 2000). It is customary in the Russian legal community to refer to this document to substantiate state policy in the development of Internet technologies in the country. Key points covered in the Charter are:

- reforming economic structures, promoting the principles of openness, reliability of information, the use of innovations in conjunction with the process of adaptation of workers;
- development of various system products that meet modern information space standards, such as: speed, reliability, safety, competitiveness;
- training personnel capable of meeting modern market requirements through the use of various educational tools and able to meet the nowadays economy demand for IT skilled staff;
- ensuring openness and accessibility of services through the use of IT tech in private economy sector;
- reaching higher level of social partnership integration by creating a system that allows people and entities to efficiently communicate with the state.

To neutralize the so called “digital divide” the great “Eight” signed the plan to create national strategies for the Information Society. In the Russian Federation, such a national strategy is "Electronic Russia". Together with the Federal Target Program "Electronic Russia" (Order of the Government of the Russian Federation 2002) a number of regulatory and legal documents have been developed and among them we can note the Concept of Regional Informatization (Order of the Government of the Russian Federation 2014). The purpose of this regulatory legal act was to focus on socially significant areas of public administration of the constituents of the Russian Federation (national security, education, health care, social protection, housing and communal services). The concept also built a model for managing the regional informatization process, identified problematic areas and noted the needs of the region, in order to solve issues by using the potential of IT technologies.

The next most important stage emerged in 2017 when national government approved a strategy of digital (information) society development up to 2030. This legal act was first to interpret digital economy as an economic activity that considers production of digital data, processing and the use of which significantly improves the efficiency of economic growth as a supreme factor (Federal Law of 9 May 2017 N 203-FZ).

There are several keynote documents on digital policy in Russia that consider national policy on economy digitalization and its prospects and presumable outcomes, provide guidance for management of such process and observe strategic goals and objectives.

Such documents define the strategic goals, objectives and measures that must be fulfilled in order to effectively and successfully apply digital policy, digitalize national economy and ensure strategic priorities and interests of the state.

The digital economy has many advantages, among which we would like to highlight the following:

- saving time in any type of work using modern technology;
- quick access to the necessary information;
- fast exchange of information;
- significant savings in material and labor resources;
- facilitating control over labor and production processes;
- improving the quality of management .

The last of these advantages of the digital economy appeals to local government work.

Regarding the development of information technologies, conditions are being formed for the transformation of municipal management. Local bodies use IT tech to simplify and accelerate provision of services to the people. There are multifunctional centers that allow such processes and they are built in a similar way as the federal public services portal is. This allows, for example, to get information on the status of entities and individuals as well as monitor changes of such status.

E-municipality was conceptualized quite recently and is nowadays meant as a means of digital tech complex that provides the ability to efficiently solve problems emerging locally, digitalizes workflow of local governments, allows paperless document flow, and simplifies management. There is a national program of 2014 that serves as a foundation of the aforementioned notions (Federal Law of 15 April 2014 N 313-FZ).

The advantages of "e-municipality" are:

- the level of competitive potential, investment attractiveness of the municipality as a progressive structure is increasing;
- round-the-clock access to the administration and certain information, personalization of services is formed;
- people are more satisfied with the quality of local services;
- geographic location can be disregarded;
- local authorities operate more openly and transparently;
- acceleration of time for obtaining information when creating unified forms of documents for various services and filling them out with automatic distribution via the Internet, active dissemination of information technologies among residents and enterprises and discussion of sensitive issues through websites and chats, free access to any service, staff reduction employees, transparency and accountability of the work of local authorities (Sidorenko et al., 2019).

The processes of this transformation of the municipal government system meet certain criteria: scale, mobility, interoperability, which allows the formation of a unified IT infrastructure of municipal government. "E-municipality" motivates IT tech to establish local social projects to provide local services.

It is important to understand that the servants provided by the municipal government should "develop according to the principle "any citizen - any department, any time, any place". This principle consists in the elimination of bureaucratic barriers in obtaining services of any category anywhere, and at all stages of the provision of services they can be tracked electronically (Petrova, 2017).

Nowadays reality dictates the need for IT tech in local services niche. As every other service market, local services suffer lack of demand when no digital service is available to ensure contactless communication. That is especially relevant at the time of a pandemic. However, lack of digitalization of local services is a straightforward outcome of insufficient financing and endless budget cuts on top of it. It can also be explained by the lack of IT specialist that can ensure digitalization and efficient work of complex information systems as well as build AI based software. One can note that all these issues are rather easy to solve and their salvation will surely contribute to growth of life quality and happiness among citizens. Asian, European and US experience with "e-municipality" and "e-government" is as relevant as ours. These projects have already suffered two generations of development over just a few recent years. The first generation of the systems allowed transferring information from local and state bodies to entities and individuals. The second one, however was programmed to cover more groundwork and evolved into a web-portal that allows active interaction and unifies and centralizes information resources. It is supposed and speculated that the third generation shall be more effective and shall work as "gateways of one window" (Zotov, 2017). Creation of all kinds of information systems, regardless of the width of their use (regional, federal, local) is bound to the need of ensuring system integrity (to build tools that allow "electronic municipality" integrate with "electronic government" and "electronic state") (Korobova, 2021; Sidorova, 2021). However, to do that substantial development of digital legal policy and technical work are necessary.

Practice shows that in its current form "e-municipality" does not use information technology to its full. The introduction of new principles of municipal governance is hindered by the prevalence of manual data entry into municipal information systems. In this situation, there is a high risk of manipulating information. Data on electronic media is vulnerable, so data storage in municipal systems must be properly secured. Ensuring the security of information technology will ensure citizens' confidence in the digital economy (Styrin et al., 2019). It should also be recognized that nowadays regions lack necessary conditions for effective and rapid digitalization. The main cause of such issue is the significant technological underdevelopment not only of municipalities, but also of the country as a whole.

## **7. Conclusion**

Municipal informatization currently faces many problems including insufficient funding (residual principle, a gap in individual municipalities), uneven broadband channels (inaccessibility for many rural areas), insufficient qualification of human resources on the ground, one-way communication channels with regional and federal authorities (assignment of some of the functions for the development of digital technologies to the localities without funding them), shortcomings in organizational and methodological support (there is no single system of normative and reference information, which leads to incompatibility, duplication, fragmentation of information resources). Nevertheless, the ongoing measures for the digitalization of local governments affect all processes. AIS appear that allow to execute management and standardize processes, accumulate data and simplify workflow. It is undeniable that such systems shall be

mandatory local tools in a foreseeable future. For the successful digitalization of the economy, appropriate funding is a necessity as are the priority development of digital management qualification, real breakthrough research of the impact of artificial intelligence and digital technologies on the municipal governance system. Digital transformation requires new approaches and above all investment in professional training and continuous training of state and municipal employees.

In general, in order to solve many problems in the field of digitalization of municipal governance at the local level, appropriate regulatory and legal acts should be developed that would define the basic concepts and principles of legal policy on local digital economy and set standards of its use. The importance of forming a local regulatory framework for the functioning of local governments in close regard of information technologies development is that each constituents of the Russian Federation has its own specific characteristics due to its historical development, geographic location, etc. These features must be considered in developing a regulatory framework for informatization of each municipal formation.

## References

- Federal Law of 28 June 1993 N 966-FZ "On the Concept of Legal Informatization of Russia".  
[http://www.consultant.ru/document/cons\\_doc\\_LAW\\_51038/](http://www.consultant.ru/document/cons_doc_LAW_51038/)
- Federal Law of 15 April 2014 N 313-FZ "On approval of the state program of the Russian Federation "Information Society". [http://www.consultant.ru/document/cons\\_doc\\_LAW\\_51038](http://www.consultant.ru/document/cons_doc_LAW_51038)
- Federal Law of 9 May 2017 N 203-FZ "On the Strategy for the Development of the Information Society in the Russian Federation for 2017 - 2030".  
[http://www.consultant.ru/document/cons\\_doc\\_LAW\\_51038/](http://www.consultant.ru/document/cons_doc_LAW_51038/)
- Federal Law of 3 February 2019 N 234-FZ "On the management system for the implementation of the national program "Digital Economy of the Russian Federation" (together with the "Regulations on the management system for the implementation of the national program "Digital Economy of the Russian Federation"). [http://www.consultant.ru/document/cons\\_doc\\_LAW\\_51038/](http://www.consultant.ru/document/cons_doc_LAW_51038/)
- Korobova, A.P. (2021). Legal policy in the era of digitalization. In S. I. Ashmarina, & V. V. Mantulenko (Eds.), *Current Achievements, Challenges and Digital Chances of Knowledge Based Economy State's. Lecture Notes in Networks and Systems*, 133 (pp. 131-138). Springer.
- Message of the President of the Russian Federation to the Federal Assembly of 03.01.2018. "Russian Newspaper", N 46.
- Okinawa Charter of the Global Information Society (Adopted in Okinawa on July 22, 2000).  
[http://www.consultant.ru/document/cons\\_doc\\_LAW/](http://www.consultant.ru/document/cons_doc_LAW/)
- Order of the Government of the Russian Federation of January 28, 2002 N 65 «Federal target program «Electronic Russia (2002-2010)». [http://www.consultant.ru/document/cons\\_doc\\_LAW\\_51038/](http://www.consultant.ru/document/cons_doc_LAW_51038/)
- Order of the Government of the Russian Federation of December 29, 2014 N 2769-r "On approval of the Concept of regional informatization". [http://www.consultant.ru/document/cons\\_doc\\_LAW\\_51038/](http://www.consultant.ru/document/cons_doc_LAW_51038/)
- Petrova, T.A. (2017). Local government in modern realities. *Bulletin of the Tomsk State University. Economy*, 39, 174-181.
- Sidorenko, E. L., Bartsits, I. N., & Khisamova, Z. I. (2019). The efficiency of digital public administration assessing: Theoretical and applied aspects. *Issues of State and Municipal Administration*, 2, 93-114.
- Sidorova, A. V. (2020). Subject structure of the offense in artificial intelligence (AI) and robotics. In S. Ashmarina, M. Vochozka, & V. Mantulenko (Eds.), *Digital Age: Chances, Challenges and Future. ISCDTE 2019. Lecture Notes in Networks and Systems*, 84 (pp. 541–547). Springer.  
[https://doi.org/10.1007/978-3-030-27015-5\\_64](https://doi.org/10.1007/978-3-030-27015-5_64)
- Styrin, E. M., Dmitrieva, N. E., & Sinatullina, L. H. (2019). Government digital platform: From concept to implementation. *Public Administration Issues*, 4, 31-60.
- Zotov, V. B. (2017). Modern information technologies as means of increasing the efficiency of local government bodies. *Municipal Academy*, 4, 8-20.