



International Journal of Economic Research

ISSN : 0972-9380

available at <http://www.serialsjournals.com>

© Serials Publications Pvt. Ltd.

Volume 14 • Number 15 (Part 4) • 2017

Management of Companies in the Digital Economy

Kamaletdinov A. Sh.¹, Litvinov Alexei Nikolaevich², Danilina Marina Viktorovna³, Kirpicheva M.A.⁴, Delia V.P.⁵, Ivanova N.V.⁶, Surkova E.V.⁷ and Sorokina Anastasiya Vladimirovna⁸

¹*Kamaletdinov Anvar Shagizovich, Candidate of Physico-Mathematical Sciences, Associate Professor, Associate Professor at the Department of Management, Financial University under the Government of the Russian Federation, Moscow, Russia*

²*Ph.D., Assistant professor, Finance University under the government of the Russian Federation, Moscow, Russia*

³*Ph.D., REU Plekhanov, Finance University under the government of the Russian Federation, Moscow, Russia*

⁴*Kirpicheva Maria Alexandrovna, Candidate of Economics sciences, Associate Professor at Department of Management, Financial University under the Government of the Russian Federation, Moscow, Russia*

⁵*Delia Viktor Parlovich, Doctor of Economics, Professor, Rector of the Institute for Socio-Economic Forecasting and Modeling, Balashikha, Russia*

⁶*Ivanova Natalia Vyacheslavovna, candidate of economic sciences, associate professor, Institute for Socio-Economic Forecasting and Modeling, Balashikha, Russia*

⁷*Ph.D. in economics, Associate Professor, Department Economy of Industry, MAI (Moscow Aviation Institute), National Research University, Moscow, Russia*

⁸*Ph.D. in Economic sciences, Assistant Professor, Russian University of Transport (RUT - MIIT), Russian Transport University, Moscow, Russia*

ABSTRACT

With the use of digital technologies, everyday human life, production relations, economic structure and education change, and new requirements arise for communications, computing power, information systems and services. The article analyzes the opportunities for companies to function in a new reality in the digital economy.

Keywords: Digital economy, management, company, business, Russia.

With the use of digital technologies, everyday human life, production relations, economic structure and education change, and new requirements arise for communications, computing power, information systems and services. At present, data is becoming a new asset, mainly due to their alternative value, that is, as data is applied to new purposes and used to implement new ideas. In 1995, the American computer scientist

Nicholas Negroponte (Massachusetts University) introduced the term “digital economy”. Now this term is used all over the world, it has become common practice for politicians, entrepreneurs, journalists. Last year, one of the World Bank’s main reports contained a report on the state of the digital economy in the world (the report was entitled “Digital dividends”).

However, until now the content of this concept remains blurred, there is no clear definition in the WB report either. In this material, RIA “Science” collected the most common ideas about what the digital economy is. For starters, it is worth recalling the definition of the usual “analog” economy - it is the economic activity of society, as well as the totality of relations that are formed in the system of production, distribution, exchange and consumption. Using a computer, the Internet, mobile phones can already be considered a “consumption”, in which case the digital economy can be represented as that part of the economic relations that is mediated by the Internet, cellular communication, ICT.

Doctor of Economic Sciences, Corresponding Member of the Russian Academy of Sciences - Vladimir Ivanov gives the broadest definition: “The digital economy is a virtual environment that complements our reality.” Indeed, probably all our actions in computer virtual reality can be attributed to the system of production, distribution, exchange or consumption. But, of course, virtual reality, as such, did not appear with the creation of a computer. All the thinking activity of a person can be attributed to it. In addition, money - the main tool of the economy - is also the generation of virtuality, as they are the invented “measure” of the value of goods and services.

But with the invention of the computer it was possible to “digitize” money, which undoubtedly simplified the commodity-money relations, led to a huge time saving and increased security of operations. Meshcheryakov Roman - Professor of RAS, Doctor of Technical Sciences, Vice-Rector for Research and Innovation of Tomsk State University University of Control Systems and Radio Electronics believes that there are two approaches to the term “digital economy”. The first approach is “classical”: the digital economy is an economy based on digital technologies and at the same time it is more correct to characterize exclusively the field of electronic goods and services.

Classical examples - telemedicine, distance learning, sale of medication (movies, TV, books, etc.). The second approach is advanced: “digital economy” is an economic production using digital technologies. “Currently,” says Roman Meshcheryakov, “some experts believe that it is necessary to expand this understanding and include in it a chain of goods and services that turn out to be using digital technologies, including such concepts as: Internet of things, Industry 4.0, smart factory, communication networks of the fifth generation, engineering services and so on”.

Indeed, before the virtual part of the world, which was located in the human mental reality, was not a productive force, it was not the environment where new ideas and products were created. Now the virtual part is combined with the real one: you can create a “world-based” world that itself will be an “economy in the economy.” The advantage of this world is that you can do anything there. This is important not only when it becomes possible to create an online game where you can jump up to the height of a multi-store building, travel through space without a spacesuit and die many times - this is important for testing, improving, testing new products. Thus, the digital economy has got a chic chance to overtake the “analog”, which is obliged to conduct a crash test every time, breaking machines in reality, and not in a virtual environment.

Alexandra Engovatova - candidate of economic sciences, associate professor of the Department of Economics of Innovations of the Faculty of Economics of Moscow State University named after MV Lomonosov. Lomonosov, “defines this:” The digital economy is an economy based on new methods of generating, processing, storing, transmitting data, and digital computer technologies. “Within the framework of this economic model,” stresses Alexander Engovatova, “the existing market business models are undergoing a radical transformation, the model of the formation of added value is changing significantly, the importance of intermediaries at all levels in the economy is sharply reduced.

In addition, the importance of an individual approach to the formation of the product increases, because now we can model anything”. Summarizing, we can say that the digital economy can cover all that can be formalized, that is, turning into logical schemes. And life itself will find the opportunity to write this “something” into the system of production, distribution, exchange and consumption. The program “Digital Economy of the Russian Federation” is aimed at creating conditions for the development of the knowledge society in the Russian Federation, improving the welfare and quality of life of citizens of our country by increasing the availability and quality of goods and services produced in the digital economy using modern digital technologies, increasing awareness and digital literacy, improving accessibility and quality of public services for citizens, as well as security both within and outside the country.

The objectives of this Program are: to create an ecosystem of the digital economy of the Russian Federation in which data in digital form is a key factor in production in all spheres of socio-economic activity and in which effective interaction, including cross-border, business, scientific and educational community, state and citizens; creation of necessary and sufficient conditions of institutional and infrastructural nature, elimination of existing obstacles and restrictions for the creation and (or) development of high-tech businesses and preventing the emergence of new obstacles and constraints both in traditional sectors of the economy, and in new industries and high-tech markets; increase of competitiveness in the global market both separate branches of economy of the Russian Federation, and economy as a whole.

The digital economy is represented by the following three levels, which in their close interaction affect the lives of citizens and society as a whole: markets and sectors of the economy (areas of activity) where specific subjects (suppliers and consumers of goods, works and services) interact; platforms and technologies, where competence is formed for the development of markets and industries (spheres of activity); an environment that creates the conditions for the development of platforms and technologies and effective interaction between the subjects of markets and industries (spheres of activity) and covers regulatory regulation, information infrastructure, personnel and information security.

Due to the fact that effective development of markets and industries (spheres of activity) in the digital economy is possible only in the presence of developed platforms, technologies, institutional and infrastructural environments, this Program is focused on the two lower levels of the digital economy - the basic directions, defining the goals and objectives of development : key institutions, within which conditions are created for the development of the digital economy (regulatory regulation, personnel and education, the formation of research competences and technological reserves); basic infrastructural elements of the digital economy (information infrastructure, information security). At the same time, each of the areas of development of the digital environment and key institutions takes into account the support for the development of both existing conditions for the emergence of breakthrough and promising end-to-end

digital platforms and technologies, and the creation of conditions for the emergence of new platforms and technologies.

The main end-to-end digital technologies that fall within the scope of this Program are: large data; neurotechnology and artificial intelligence; distributed registry systems; quantum technologies; new production technologies; industrial Internet; components of robotics and sensorics; wireless technology; technology of virtual and augmented realities. A change in the list of such technologies is envisaged as the emergence and development of new technologies. Implementation of certain areas by sectors of the economy (spheres of activity), primarily in the health sector, the establishment of smart cities and public administration, including supervisory activities, will be implemented on the basis of supplementing this Program with relevant sections, as well as developing the implementation of relevant action plans (“road maps”), formed within the framework of the management system for the implementation of this Program.

Realization of this Program requires close interaction of the state, business and science, since the main result of its implementation should be the creation of at least 10 national leader companies - high-tech enterprises developing “end-to-end” technologies and managing digital platforms that operate on the global market and form around a system of “start-ups”, research teams and industrial enterprises, which ensures the development of the digital economy.

In 2016, the proportion of residents using broadband Internet access was 18.77 percent. At the same time, there were 159.95 mobile phones per 100 people and out of 100 people 71.29 people used mobile access to the Internet. The average speed in the Internet in Russia grew by 29 percent (to 12.2 Mbit / s), which is why Russia is on the same level with France, Italy and Greece.

By early 2017, the Russian market for commercial data storage and processing centers had grown to 14.5 billion rubles, which is 11 percent more than in 2016, which was largely due to regulatory requirements for the storage of personal data of Russian citizens in Russia. However, unlike most countries, Russia does not have standards for assessing data storage and processing centers, and there is therefore no objective opportunity to assess the level of services provided, including the amount of data that can be stored. Also, the market for cloud services is steadily growing - by about 40 percent annually.

In order to manage the development of the digital economy, the Program defines the goals and objectives within the framework of the five basic directions for the development of the digital economy in the Russian Federation for the period up to 2024. The basic directions include normative regulation, personnel and education, the formation of research competences and technical facilities, information infrastructure and information security.

The main goal of the direction related to regulatory regulation is the formation of a new regulatory environment that provides a favorable legal regime for the emergence and development of modern technologies, as well as for the implementation of economic activities related to their use (digital economy).

In this direction it is supposed: creation of a permanent mechanism for managing changes and competences (knowledge) in the field of regulating the digital economy; removal of key legal restrictions and the creation of separate legal institutions aimed at solving the priority tasks of the formation of the

digital economy; formation of complex legislative regulation of relations arising in connection with the development of the digital economy; taking measures aimed at stimulating economic activity related to the use of modern technologies, the collection and use of data; the development of a policy for the development of the digital economy on the territory of the Eurasian Economic Union, the harmonization of approaches to regulatory legal regulation that promote the development of the digital economy in the space of the Eurasian Economic Union; creation of a methodical basis for the development of competences in the field of regulation of the digital economy.

References

- Цифровая экономика: как специалисты понимают этот термин, РИА Новости, 16.06.2017, <https://ria.ru/science/20170616/1496663946.html>
- Программа «Цифровая экономика Российской Федерации» утверждена распоряжением Правительства Российской Федерации от 28 июля 2017 г. № 1632-р,
<http://static.government.ru/media/files/9gFM4FHj4PsB79I5v7yLVuPgu4bvR7M0.pdf>
- Указ Президента Российской Федерации от 9 мая 2017 г. № 203 “О Стратегии развития информационного общества в Российской Федерации на 2017 - 2030 годы”
- Eroshkin, S.Y., Kameneva, N.A., Kovkov, D.V. & Sukhorukov, A.I. (2017). “Conceptual system in the modern information management”. *Procedia Computer Science*, 103: 609-612, doi: 10.1016/j.procs.2017.01.079
- S.Yu. Eroshkin, N.D. Koryagin, D.V. Kovkov, D.V. Panov, A.I. Sukhorukov (2017). “The Paradigm of the Integration of Different Types of Management Information Systems in Investment and Construction Company Implementing the Project Approach“. *Procedia Computer Science*, 103: 605-608, doi: 10.1016/j.procs.2017.01.076

