

STSTI:
06.81.23

TALENT MANAGEMENT: THE DEVELOPMENT OF DIGITAL COMPETENCIES OF CIVIL SERVANTS IN AKMOLA REGION

Saule Iskendiroya¹,
Makpal Shalabayeva²,
Dinara Zhulamanova³

¹ PhD in Economics, Associate Professor. Professor of Branch of the Academy of Public Administration under the President of the Republic of Kazakhstan in Akmola region, Kokshetau, Kazakhstan email: s.iskendiroya1968@gmail.com

² Master of Computing. Senior lecturer of Branch of the APA under the President of the Republic of Kazakhstan in Akmola region, Kokshetau, Kazakhstan email: shalabaeva92@gmail.com

³ PhD student, Management, Turan University Almaty, Kazakhstan email: zhakdinara@mail.ru

<https://doi.org/10.52536/2415-8216.2023-1.05>

Annotation. Nowadays due to the wide application of information communication technologies in any kind of office work, the development of digital skills is becoming a necessity to stay productive at the workplace. Rising Kazakhstan's digitalization speed led to the need for enhancement of the digital technology proficiency level of government employees. This article describes the current level of digital competencies of Akmola region's civil servants. The data for the analysis is collected from questionnaires in electronic format and is designed in the form of visual graphs. As a result of the analysis, conclusions, and recommendations for improving digital skills training are made. .

Key words: *digital competencies; public administration, digital skills, digital technologies, civil servants*

ТАЛАНТТАРДЫ БАСҚАРУ: АҚМОЛА ОБЛЫСЫНДА МЕМЛЕКЕТТІК ҚЫЗМЕТКЕРЛЕРДІҢ ЦИФРЛЫҚ ҚҰЗЫРЕТТЕРІН ДАМУ

Сәуле Искендірова¹, Мақпал Шалабаева², Динара Жуламанова³

¹ Рэкономика ғылымдарының кандидаты, доцент, Қазақстан Республикасы Президентінің жанындағы Мемлекеттік басқару академиясының Ақмола облысындағы филиалының профессоры, Көкшетау, Қазақстан, email: s.iskendirowa1968@gmail.com

² есептеу техникасы магистрі, Ақмола облысындағы Қазақстан Республикасы Президенті жанындағы МБА филиалының аға оқытушысы, Көкшетау, Қазақстан, email: shalabaewa92@gmail.com

³ PhD докторант, Тұран университеті Алматы, Қазақстан, email: zhakdinara@mail.ru

Аңдатпа. Қазіргі уақытта кеңсе жұмысының кез-келген түрінде ақпараттық-коммуникациялық технологияларды кеңінен қолдануға байланысты цифрлық дағдыларды дамыту жұмыс орнында өнімділікті сақтау қажеттілігіне айналу-да. Қазақстанда цифрландыру процесі өсіп келе жатқан қарқыны мемлекеттік қызметшілердің цифрлық технологияларды меңгеру деңгейін арттыру қажеттілігіне әкелді. Бұл мақалада Ақмола облысының мемлекеттік қызметшілерінің цифрлық құзыреттерінің ағымдағы деңгейі сипатталған. Талдау үшін деректер сауална-ма арқылы электронды форматта жиналды және визуалды графиктер түрінде ресімделді. Талдау нәтижесінде цифрлық дағдыларды оқытуды жетілдіру бойын-ша қорытындылар мен ұсыныстар жасалды.

Түйін сөздер: *Цифрлық құзыреттер; мемлекеттік басқару, цифрлық дағдылар, цифрлық технологиялар, мемлекеттік қызметшілер.*

УПРАВЛЕНИЕ ТАЛАНТАМИ: РАЗВИТИЕ ЦИФРОВЫХ КОМПЕТЕН-ЦИЙ ГОСУДАРСТВЕННЫХ СЛУЖАЩИХ В АҚМОЛИНСКОЙ ОБЛАСТИ

Сәуле Искендірова¹, Мақпал Шалабаева², Динара Жуламанова³

¹ кандидат экономических наук, доцент, профессор филиала Академии государственного управления при Президенте Республики Казахстан в Акмолинской области, Кокшетау, Казахстан, email: s.iskendirowa1968@gmail.com

² магистр вычислительной техники, старший преподаватель филиала АГУ при Президенте Республики Казахстан в Акмолинской области, Кокшетау, Казахстан, email: shalabaewa92@gmail.com

³ PhD докторанты, Университет Туран, Алматы, Казахстан, email: zhakdinara@mail.ru

Аннотация. В настоящее время в связи с широким применением информаци-онно-коммуникационных технологий в любом виде офисной работы развитие циф-

ровых навыков становится необходимостью для поддержания продуктивности на рабочем месте. Растущие темпы цифровизации Казахстана привели к необходимости повышения уровня владения цифровыми технологиями государственными служащими. В данной статье описывается текущий уровень цифровых компетенций государственных служащих Акмолинской области. Данные для анализа были собраны с помощью анкетирования в электронном формате и оформлены в виде наглядных графиков. В результате проведенного анализа сделаны выводы и рекомендации по совершенствованию обучения цифровым навыкам.

***Түйін сөздер:** Цифровые компетенции; государственное управление, цифровые навыки, цифровые технологии, государственные служащие.*

Introduction

In connection with the digital transformation of the Kazakhstan economy, it becomes necessary for government to develop personnel who directly affect the success of the organization and must have modern digital skills.

Talent management is a systematic approach to the development of human capital. Attracting, retaining, as well as encouraging work, increasing the level of commitment and increasing the level of professional growth through the integration of various activities, including digital skills. This is important for the consolidation of specialists in the field of public administration, for further professional growth of employees.

From 2018 until 2022, the State Program "Digital Kazakhstan" was launched, one of areas of which is the system of public administration. Digital public administration is based on 3 main areas: the relationship between government and government, government and citizens, government, and business. In this regard, it becomes relevant to develop civil servants' digital competencies to make sure that they go along with the progress of the digital world, as well as increase readiness for digital transformation. In general, digitalization is the use of digital resources to transform the work of the organization. The importance of training civil servants in digital literacy lies in the fact that new requirements for the knowledge and skills of employees is necessary for their activities in the digital environment [1].

In this regard, a study was carried out on the courses of advanced training and retraining of civil servants. The purpose of this article is to study the difficulties of mastering digital skills by civil servants and the formation of recommendations for improving training.

In the context of increasing processes of globalization and integration, human capital acts as a tool and the main lever for increasing the competitiveness of the country. For successful competition on the world stage, countries need to train highly qualified personnel who will be able to use their knowledge and skills to develop the country's economy [2]. Therefore, Kazakhstan has developed a system for assessing civil servants to maintain the quality of the country's

existing human resources.

According to the Order of the Chairman of the Agency of the Republic of Kazakhstan for Civil Service Affairs and Anti-Corruption (dated January 16, 2018 No. 13 in accordance with the Law on Civil Service of the Republic of Kazakhstan), the criteria for assessing civil servants included the following competencies [3]:

- Activity management;
- Cooperation;
- Decision-making;
- Efficiency;
- Self-development;
- Integrity;
- Responsibility,
- Initiabiveness,
- Stressresistance,
- Orientation to the consumer of services,
- Informing consumers of services.

From the foregoing, it can be understood that modern trends and digitalization of the economy and society remain unattended. This gap in the legislation necessitated a study to form a model of digital competencies of civil servants, as well as to identify the level of readiness of state bodies to work in a digital environment.

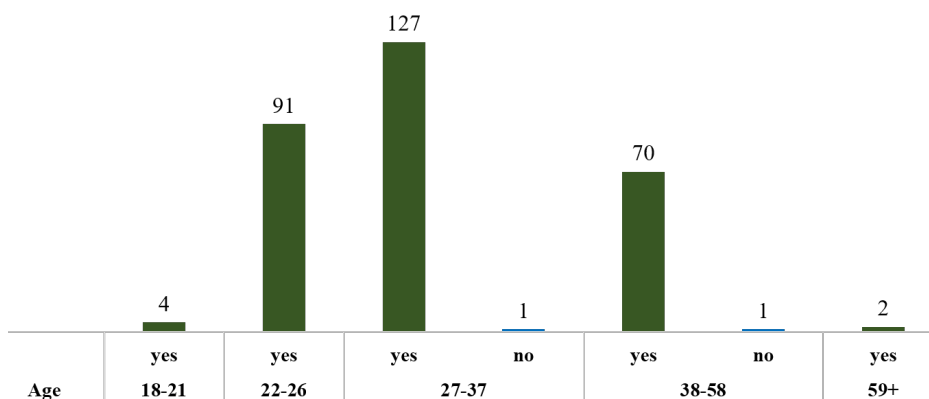
Research results and discussion

The survey and data collection were conducted on the basis of the Branch of the Academy of Public Administration under the President of the Republic of Kazakhstan in Akmola region among trained civil servants from 2020 until 2021. The authors of the article have been teaching specialists in various fields the discipline "Digital Technologies in Public Administration", "Practical Analytics", "Digital Competencies of Civil Servants (Usage skills of MS Word and MS Excel)" in the system of additional education for several years. For this study, a questionnaire based on Google Forms was developed. The method of correlation analysis with the construction of graphs was used to interpret the results obtained.

The questionnaire is probabilistic, as it was formed randomly from a general population consisting of the number of civil servants of Akmola region. According to official statistics, the average number of civil servants in the region is 4687 civil servants, a third of whom are trained annually at the branch of the Academy. At the time of the study, 1651 civil servants were covered by online training. A total of 296 questionnaires were collected, of which 10 questionnaires were not fully completed. With a 90% confidence interval, the sampling error was 3.43%, which is within the acceptable norm. Thus, the collected answers will be enough to study.

One of the questions was about the usefulness of courses of the digital competencies' development. Almost all respondents gave a positive answer. This means that civil servants feel they still have IT knowledge gaps. Even though the questionnaire results show that 99.3% of respondents, which is 294 out of 296, answered that they use various digital gadgets for work (Figure 1). Regarding the variable "age", it can be noted that most of the civil servants (127 out of 296) who use digital gadgets for work are representatives of young people in the age range from 18 to 37 years.

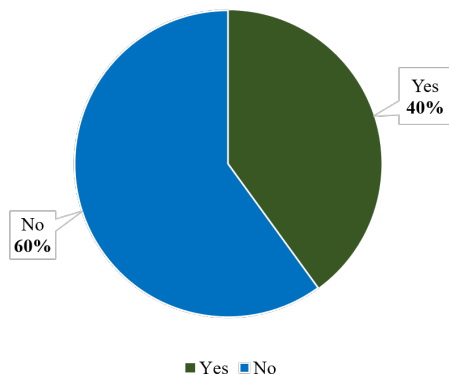
Figure 1. Distribution of answers to the question: “Do you use digital gadgets for work such as: mobile phones, computers, tablets, smart watches, TVs?”



To explore more insights from the survey, open questions have been included as well. So, there were empty cells to fill in the answers to the questions, such as, “What else would you like to learn in the next workshop, in the field of digital skills? Write your suggestions or wishes regarding this discipline.” As for the answers, the majority of respondents answered that they would like to learn more technological skills and competencies that will be useful in their work, how to create creative videos, etc. In their proposals regarding this discipline, many answered that they find such disciplines very useful and would like to learn digital skills in the future.

Since survey was conducted by the teachers, it was noticed during the training that most of the civil servants have relatively low level of office software skills. For instance, many of them are not aware of keyboard shortcuts, some use Microsoft Office products at a very rudimentary level. Moreover, some of the civil servants are never created presentations or build a diagram. As for using cloud services, for creating digital content and working on the document simultaneously by two or more people, it can be seen from the Figure 2 that more than a half of respondents do not use such technology.

Рисунок 1. Distribution of answers to the question: "Have you used Google cloud services, docs and spreadsheets before?"



The increasing use of information and communication technologies (ICTs) and the Internet environment directly in the workplace in any organization, including public services, brings to the increase the demand for new digital skills in three ways.

First, civil servants from any fields need to gain general ICT skills to be able to use them in their daily work (for instance, using the Internet, use office software).

Secondly, government need to grow new generation of IT professionals to ensure the production of ICT products and services.

Thirdly, the development of all kinds of skills in the field of ICT, such as: the use of social networks, mobile applications, cloud technologies, big data analytics, understanding the work of completely new technologies and examples of their application in public services. As a result, we should expect a high degree of variability of in-demand ICT skills, their adaptability to new working conditions and increasing their functionality [1].

Based on the results of the study, it is proposed to amend the list of qualification requirements and competencies for applicants for open governmental vacancies in terms of necessities for awareness of digital skills.

Digital capabilities are part of ICT competencies as supplementary mechanisms in terms of skills and abilities to process digital data, skills in operating with a personal computers, smartphones and typical office software, as well as knowledge of information analytics and information security aspects. It is rational to add to the ability to create content in the digital environment, the ability to manage, edit and delete information, digitally exchange skills, cybersecurity, ethics on the network, etc. [4]

To date, business processes of civil services are mostly automated. Back to main information systems of the civil service include: CDS; IS "External web portal of the Administration of the President of the Republic of Kazakhstan"[4]; EC GO RK; CES; "Adilet" - Database of regulatory legal acts of the Republic

of Kazakhstan; Architectural portal - "Electronic Government"; IIS "E-kyzmet"; Subsystem "Legal monitoring of regulatory legal acts" of the Corporate Portal of the Ministry of Justice of the Republic of Kazakhstan [5]. Such a variety of information systems used in government organizations is increasing the list of requirements for ICT knowledge and skills. Additionally, in the forthcoming periods, the infrastructure of municipal service solutions are going to experience changes as a result of the emergence of new technologies and will transform the part of working processes to the digital space. Consequently, civil servants should obtain competencies described below to use them at workplace:

1) Work with Microsoft Office softwares and electronic document management systems at a high level.

2) Capability to work with the programs and systems of state information resources.

3) Understand the process of working of information and analytic systems and be able to collect, process, store and analyze the data.

4) High skills in working with regulatory and legal information systems.

5) Knowledge of the basics of information security in part of the use of personal data, storage, and processing of service information, as well as the use of the Internet for official and personal purposes.

In the system of admission to the civil service, it is necessary to introduce procedures for assessing digital skills for devotees to all positions [3].

Especially in the situation of pandemic the information and communication technologies had a crucial role to play. Social distancing meant that online applications became important in ensuring continuity of private and business services [8].

Thus, it is proposed to expand in the job descriptions the mandatory inclusion of requirements for digital competencies, which will ensure integrated method to the establishment of requirements for applicants for public positions, more effectively shaping the pace of promotion of qualifications for civil servants and those who are in the employee's reserve.

Today in the Branch of Academy of public administration in Akmola region the courses of digital competencies are conducted twice a year. However, that covers only about 40 listeners out of about 4700 civil servants of Akmola region. Moreover, such courses are offered optionally, which means if governmental bodies wishes not to attend the course, the seminar will be cancelled. This leads to the necessity of enhancing the importance of attending such seminars that help to develop digital competencies in civil servants.

Conclusion

Today, it is known that there is a shortage of professional specialists in important economic and social spheres for the Republic of Kazakhstan, including the civil service. Among them, it is necessary to focus attention on the lack of digital knowledge and skills in the field of digital public administration, which

is developing rapidly in the country today. It is through training in advanced training courses and retraining courses that we develop important competencies of civil servants and talents for our society. At present, everyone who wishes to be successful in an any organization, must have a high level of digital competence, and this also applies to civil servants [6].

The authors led this study on digital competencies of civil servants and directions of development of their qualifications in the context of the digital revolution for the economy. This article is written using quantitative and qualitative methods of data analysis: a review of scientific literature, web resources, as well as research and data collection.

The way to enhance the digital skills if civil servants is to make mandatory advanced training courses on digital competencies once a year for all civil servants in Akmola region. Since after such courses tutors always receive positive feedback from listeners, it would be beneficial and valuable to gain knowledge in digital competencies. The courses should be divided into categories depending on the level of knowledge of the listeners, for instant, courses for advanced users and elementary level.

The anticipated recommendations will develop the level of civil servants' competencies, offering the civil service with personnel capable of quickly adapting to the conditions of rapid changes in the digital economy in the Republic of Kazakhstan.

References

1. Vasilyeva E.V., Pulyaeva V.N., Yudina V.A., "Development of digital competencies of State civil servants of the Russian Federation," *Information Systems And Technologies In Business*, vol. 4, no. DOI: 10.17323/1998-0663.2018.4.28.42, pp. 28-42, 2018.
2. S.K. Iskendirowa, K.K. Dzhaparova, R.S. Dzusupov, "Problems of higher education development in the regions on the example of Akmola region", *News of the national academy of sciences of the Republic of Kazakhstan series of social and human sciences*, no. 329, p. 136 – 142, 2020.
3. Law of the Republic of Kazakhstan No. 416-V dated November 23, 2015, "About the State service of the Republic of Kazakhstan," <https://adilet.zan.kz/rus/docs/Z1500000416>.
4. Gorskina L. S., Propp O. V., "About the need to train staff in digital skills.", *Organizational and managerial aspects of economic development of enterprises and regions*, pp. 28-34, 2019.
5. "JSC "National Information Technologies"," [Online]. Available: <https://www.nitec.kz/index.php/blog/projects>.
6. Camacho D., Panizo-LLedot A., Bello-Organ G., Gonzalez-Pardo A., Cambria E., "The four dimensions of social network analysis: An overview of research methods, applications, and software tools", *Information Fusion* 63, no. doi.org/10.1016/j.inffus.2020.05.009, pp. 88-120, 2020.
7. J. Brown, "An examination of the Skills Framework for the Information Age (SFIA) version 7", *International Journal of Information Management*, no. 51, p. doi.org/10.1016/j.ijinfomgt.2019.102058, 2020.
8. Savvas P., Jonathan H., David M., "Who led the digital transformation of your company? A reflection of IT related challenges during the pandemic", *International Journal of Information Management*, no. 55, 2020.