

Digital Transformation in Culture: Current Realities and Development Perspectives

Olena Hudzenko (0000-0003-2028-7697)

Volyn National University named after Lesya Ukrainka (Ukraine)

ABSTRACT

The article is devoted to innovative aspects of digital transformation in the sphere of culture. The author examines the impact of new products, innovative business models and digital technologies on the modern cultural landscape. Special attention is paid to the role of digital platforms in the interaction of the sphere of exchange of values and information in the context of digital art. The article notes that digital transformation is becoming a key catalyst for innovation in the cultural and artistic environment, creating opportunities for the preservation and promotion of national cultural values. The author considers various approaches to digital transformation, taking into account both a strategic partnership and a comprehensive approach, as well as the dynamics of the interaction of technologies, directions, and participants in the process of achieving new forms of activity and increasing efficiency in business. In addition, the article highlights the problems that arise during the digital transformation of objects of art and cultural heritage, in particular, such as the provision of property and copyright rights, as well as the inconsistency of terminology between information and digital cultures. The author points to the need for a new scientific discourse on digital rights for the successful implementation of digital transformation in the sphere of culture in Ukraine. The article examines the individual challenges and prospects of digital transformation for the museum industry and also emphasizes the need to create the necessary conditions for each museum separately. The author examines the influence of digital technologies on the museum sphere, providing concrete examples of the implementation of innovations (creation of museum digital collections, virtual exhibitions and tours). Based on the relevance of digital transformation in the modern world, attention is drawn to the need to improve the qualifications and awareness of specialists in the field of culture for the successful implementation of digital initiatives.

KEYWORDS

*digital transformation
cultural sphere,
digital technologies,
innovations,
digital rights.*

Introduction

The modern global world landscape is undergoing a radical digital transformation. Digital transformation processes are gaining momentum in the world and in Ukraine. Digital progress, by its very nature, has become a trend that radically changes the directions of the evolution of modern society – from the features of its social stratification to people's everyday habits and preferences. In our opinion, a comprehensive philosophical reflection of digital identity contributes not only to the expansion of the horizons of understanding the specifics of human existence in the conditions of the new information reality, but also pushes the theoretical boundaries of understanding the essence of identity, embedding digital identity in its context as a mechanism and result of adaptation to this new reality. The perception of digital reality still needs a scientific understanding of its role as the main trend of social development in the conditions of global change in the modern world. In particular, many challenges arise from a lack of understanding of the terminology used by the international community, the importance of digital transformation, as well as the complexity and scope of the necessary actions (Strutynska, 2019: 95).

In connection with the rapid progress of technologies, the concept of “digital progress” has become decisive both in the field of science and in government structures. In the context of Russia's military aggression against Ukraine and violations of legal norms in the field of illegal export of cultural values, there is a need to create a single digital register of cultural values through the implementation of digital technologies.

The digital technology sector is becoming a key aspect of modernity, in which the global trends of scientific and technological progress and the changes that generate them are intertwined. The current stage and modern culture are characterized as digital in the context of technologies replacing analog. Digital trends are rapidly changing communication methods, values, human nature, interpersonal relationships, and the surrounding world.

In everyday use, such terms as “cyber culture”, “digital generation”, “digital literacy”, “e-education”, “Internet economy”, “digital competence”, “digitalization”, etc. have spread. However, their meanings go beyond simply tech-



nological or digital context, as they encompass various cultural and socio-humanitarian aspects. Thus, modern reality is largely shaped by the conditions of the digital transition.

Note that researchers consider various aspects of the "digital transformation" phenomenon. In particular, scientific investigations concern the following visions of scientists: in general, characteristic features of digital transformation (Yakushko, 2021), digital transformation of museum affairs (Antonova, Hololobov, 2023), current problems of management of digital transformation processes in the socio-cultural sphere (Uzelac (ed.) and Cvjetičanin (ed.), 2008; Mezei, 2010; Bondar et al., 2021; Wright, 2022), human rights in the era of digital transformations (Holovko, 2019), the latest terminology in the digital paradigm (Nikitin, Kulchytskyi, 2019; Strutynska, 2019; Oryshchuk, 2023), digitization in the field of education (Hudzenko, 2023), new possibilities of digital transformations in the development of creative industries (Pletsan, 2022; Bannikova et al., 2023), phenomena of cultural identity in connection with the digital environment of cultural existence (Uvarova, 2023).

The aim of the study. Our article is aimed at highlighting the current state and prospects for the development of the cultural sphere under the influence of digital transformations.

Research tasks. Therefore, given the relevance of this issue, in our research we will identify the main trends of digital transformation in culture, investigate the impact of digital technologies on the preservation and accessibility of cultural heritage, and analyze the prospects of introducing innovations into the activities of museums, galleries and other cultural institutions. We will also consider the key challenges that arise in connection with the digital transformation in the cultural sphere, and follow possible ways of solving these problems.

Research methods

The application of general scientific methods in the study of digital transformation in culture includes the analysis of scientific articles, as well as the use of meta-analysis and bibliometric analysis to study key trends. Therefore, a systematic review of the literature was carried out, including a meta-analysis (to synthesize and generalize the results of studies covered in the articles on the impact of digital transformation on culture, allowing to determine general trends and statistical significance) and bibliometric analysis (to study trends in the development of research on digital transformation in culture and identifying the most researched aspects), to identify key trends in the research area. This approach allows you to get an objective view of the dynamics of research and highlight the main aspects of digital transformation in the context of the cultural sphere.

Results and Discussion

A. Bondar, V. Komarovskiy, V. Shobyk, and V. Yatsenko carry out a theoretical analysis of aspects of the digital transformation of the socio-cultural sphere, considering the main directions of the digital transformation of the socio-cultural sphere. According to the authors, the main drivers of the digital transformation of the socio-cultural sphere are new products and services, innovative business models, information and management technologies. A key factor in digital transformation is digital platforms that present works of art. Scientists consider digital art as a socio-cultural activity that is based on the use of digital tools to obtain a

certain socio-cultural product. As a result, the implementation of the concept of digital transformation involves the use of a digital platform, which is an integrated information system. This system provides multifaceted interaction in the field of exchange of values and information, which contributes to the reduction of general costs and optimization of business processes in the field of art (Bondar et al., 2021: 66).

Therefore, the authors' analysis of aspects of digital transformation in the socio-cultural sphere indicates the advantages of new products, innovative business models, and digital technologies. They identify digital platforms as a key enabler of interaction in the field of the exchange of values and information in the context of digital art. All this helps to reduce costs and optimize business processes in the field of art.

K. Bannikova, P. Friz, N. Voronova, A. Bondarenko, L. Bilozub note that the digital world, permeating all spheres of social life, gradually begins to claim the role of a direct creator of cultural elements. The authors emphasize that the digitalization of culture and art manifests itself in two (artistic-creative and organizational-technological) aspects, which, in particular, focus on the synergy and dynamism of the cultural and artistic space within the limits of digitalization. In their opinion, cultural and artistic development in the digital environment is accompanied by the emergence of new opportunities in organizational, technical, communication, informational, material, and technical aspects (Bannikova et al., 2023: 356). The main goal of the scientific and cultural community is the introduction of electronic tools into the creative environment to preserve the balance between its material and spiritual components (Bannikova et al., 2023: 348-349).

Therefore, digitalization acts as a catalyst for the formation of innovative trends in the cultural and artistic sphere, as it opens up opportunities for the preservation of cultural national values.

Carefully considering the definitions of "transformation" and "digitalization", I. Yakushko identifies the main features of the concept of "digital transformation". In particular, according to the scientist, digitization is a dynamic process associated with the active development, application, and improvement of information and communication technologies. And, accordingly, it leads to a change, a transformation of the usual model of the functioning of the relevant systems (Yakushko, 2021: 77). Digital transformation is the process of changing the structure of the functioning of an individual system, its elements and the relationships between them, which arises as a result of the active use of information and communication technologies. It is important to note that different categories of social systems are characterized by distinctive features of digital transformation and the consequences of its influence (Yakushko, 2021: 78-79).

Considering the above, according to I. Yakushko, digitalization is a multifaceted process. It arose and develops exclusively based on the intensive use of information and communication technologies. Digitization includes all processes related to the impact of these technologies on the development of individual systems and their interaction with other systems.

Yu. Nikitin, O. Kulchytskyi, analyzing the definitions of the terms "digital enterprise", "digital business", "digital transformation", offer the following vision of this category: "Digital transformation is the process of transition to new ways of enterprise activity through the introduction of digital technologies and digital services, based on the strategic

partnership of all interested parties and the simultaneous development of software, digital transformation and assessment of the level of digital transformation of the enterprise" (Nikitin, 2019: 83).

Thus, I. Yakushko defines digitization as a complex process that finds its embodiment in the use of information and communication technologies and affects the evolution of individual and intersystem relations. On the other hand, Nikitin and Kulchytsky consider digital transformation as a transition to new models of business activity through the introduction of digital technologies and services, which involves strategic partnership and a comprehensive approach to the development of digital transformation infrastructure. Both approaches indicate that digital transformation is a dynamic phenomenon that involves the interaction of technologies, strategies and actors to achieve new forms of business activity and efficiency.

Theoretical understanding of new dynamic processes of creation, provision and distribution of cultural goods in the spheres of creative industries contributes to the creation and development of innovative digital models and digital strategies of digital culture. A key aspect is the promotion and spread of creative industries, as a necessary component of the cultural sphere, which has great potential in the formation of cultural diversity. Such development of creative industries synergistically combines traditions, cultural values, aspects of personality and society, innovative concepts and digital technologies (Pletsan, 2022: 85).

Digitization of the creative industry should be analyzed as a complex system that produces a consistent transformation of the socio-cultural code of Ukrainian society and affects all its segments. The main principles of implementing digitization processes in creative industries (since it is necessary to ensure wide access to creative products of creative industries and spread cultural norms in space and time) are the principles of inclusiveness, innovativeness, active participation, efficiency, reproducibility, and accessibility (Pletsan, 2022: 87).

We are impressed by the position of H. Pletsan, because, indeed, the theoretical understanding of dynamic processes in the spheres of creative industries contributes to the development of innovative digital models and strategies of digital culture, emphasizing the importance of promoting creative industries as a key component of the cultural sphere. The principles of inclusivity, innovation, and accessibility defined in the digitalization of creative industries contribute to wide access to creative products and the spread of cultural norms.

According to T. Uvarova, culture serves as the basis for the formation of identity and the highest meaning of human life. Digitization should be considered not just the next stage of scientific and technological progress, but as an integral part of complex civilizational processes. This vision shows changes in a person's perception of himself in real and desired dimensions, and also reflects transformations of identity, primarily cultural. Identity is the most important attribute of human existence and a means of self-awareness and is a reflection of the changes that occur with a person as a result of his immersion in the virtual space, which is becoming more and more social. This leads to new forms of identification through digital images and the creation of new digital forms of identity (Uvarova, 2023: 297). Transformations in cultural identity occur due to the introduction of technological innovations and the use of digital technologies (Uvarova, 2023: 298).

Online and offline formats contribute to blurring the distinction between reality and virtuality. This leads to the transformation of traditional anthropological constants. In particular, the individual ceases to be a purely physical subject, including, in particular, biological, social and psychological aspects, supplemented by digital ones. These transformations also affect interpersonal relationships. Cardinal changes are observed in all key fields of culture and in the system of formation of cultural experience (Uvarova, 2023: 314-315). T. Uvarova investigates the transformation of cultural identity as a result of the widespread adoption of digital technologies. In particular, the scientist singles out transformations of personal identity, as well as essential changes in the communicative sphere. The author of the study states that the design of digital identity causes changes and transformations in cultural identity, which, in turn, becomes multicultural. At the same time, the peculiarities of identification processes are diversified and symbolized by value (Uvarova, 2023: 315). So, we agree with T. Uvarova that digital transformations affect cultural identity, causing transformations in the personal and communicative spheres, which leads to multiculturalism and new forms of identification.

According to V. Oryshchuk, digital development should be considered as the introduction of digital technologies and tools in all industries for the formation of innovative products, services and solutions aimed at increasing efficiency, productivity and competitiveness in various fields. This means using computers and digital tools to develop innovative technologies and platforms that meet user needs and solve societal problems (Oryshchuk, 2023: 100).

In particular, the scientist believes that the most effective way to preserve national values (in particular, in relation to museum affairs) is the use of digital technologies (Oryshchuk, 2023: 94). The author defines the concept of "digital development in the field of museum affairs" as the introduction and use of digital tools and technologies in museum policy, museum practice and museology. Regarding the possible ways of implementing the state policy on digital development (which is aimed at ensuring stability and development), it can be legislative acts, financial incentives, software services, and also special institutions directing the implementation of this policy. In particular, with regard to digital development in the field of museum affairs, the following ways and methods can be used: the development and introduction of digital technologies (for the purpose of creating museum digital collections, protection and dissemination of cultural heritage), as well as, to attract the audience, the introduction of virtual exhibitions and tours and other innovative methods (Oryshchuk, 2023: 100).

A. Bondar, V. Komarovskiy, V. Shobyk, V. Yatsenko believe that the high availability of digital images of artifacts significantly increases their economic and social value. The spread of digital presentation of the collection allows museums not only to receive new income in the information environment, but also significantly increases its value thanks to digital cultural content.

Although digital technologies are expanding access to museum collections in all aspects, the methods of obtaining additional value from presence in the digital information environment remain undefined. To achieve this goal, it is necessary to develop a new business model for cultural institutions, which is based on the direct interaction of users, artists, scientists and administrators.

Especially important is the possibility of overcoming existing institutional boundaries by forming a thematic exposition, where various museum collections act as a single, common heritage of humanity (Bondar et al., 2021: 71).

Therefore, we are inclined to the opinion of the mentioned authors, who indicate the importance of digital development in all areas for the formation of innovative products and services, in particular, in the museum business. After all, digital technologies not only help to preserve cultural values and expand access to museum collections, but also cause the need for new business models for cultural institutions. In this context, the possibility of overcoming institutional boundaries and forming a common heritage of humanity through thematic expositions becomes important.

Note that, despite the considerable amount of scientific research on the use of digital technologies for the presentation of works of art, unfortunately, a methodology for determining the motivation, participation and behavior of visitors to cultural institutions and museums has not yet been proposed. The development of such a methodology is recognized as the next step in the development of the processes of digital transformation of the socio-cultural sphere.

It should be noted that one of the significant problems that arises during the digital transformation of objects of art and cultural heritage is the provision of property and copyright rights (Bondar et al., 2021: 70).

The inconsistency of terminology between information and digital cultures, as key elements of guaranteeing human safety in the information space, makes it difficult to realize the opportunities opened by the era of digital transformations. The interrelationship of information and digital cultures is becoming evident, and the competencies they provide enable the realization of rights to digital information and education, access to the Internet, etc. Information and digital rights are considered as unity and part, which leads to some confusion in the legal field. Digital rights are related to information rights and reflect the essence of the development of competencies, which are determined by a high level of human information culture. However, the era of digital transformations gives rise to a new scientific discourse that indicates the emergence of new rights: the right to digital access to the Internet, the right to use virtual reality, the right to access digital education, etc. (Holovko, 2019: 42-43).

Therefore, let us emphasize that during the digital transformation of objects of art and cultural heritage, significant problems arise, in particular, the provision of property and copyright rights, as well as complications in the realization of opportunities due to the inconsistency of terminology between information and digital cultures, which creates confusion in the legal field and requires a new scientific discourse on digital rights.

It should be noted that the cultural policy of the state significantly affects the processes of digital transformation of the museum sphere in Ukraine. To improve the current state of affairs, it is necessary to work on the development and implementation of new strategies aimed at attracting investments and proper financing of cultural projects. Also, it is important to ensure the legal protection of intellectual property and the development of the necessary infrastructure for the successful digital transformation of the museum industry (Antonova, 2023: 326).

Domestic museums can become more accessible and attractive to a wide audience by presenting the cultural heritage of Ukraine in a new, digital format. The continuation

of the development of digital technologies in the field of museum activity contributes to the preservation and virtual demonstration of the cultural heritage of the Ukrainian state, especially in connection with changes in consumer habits and the rapid development of technologies (Antonova, 2023: 326).

Therefore, in the opinion of the scientist, in order to successfully implement the digital transformation of the museum industry in Ukraine, it is necessary to provide the necessary conditions and state support, to develop an individual digital transformation strategy for each museum, and to actively work on improving the qualifications and awareness of specialists in the field of culture (Antonova, 2023: 326).

Conclusions

As a result of a comprehensive analysis of the interaction between technological, cultural and legal aspects of digital transformation in the field of culture, it is shown that digital transformation in the field of art and culture opens up broad perspectives, contributing to the creation of innovative products and effective business models through the implementation of digital technologies and platforms. For the successful implementation of digital transformation in the artistic and cultural spheres in Ukraine, it is important to develop individual strategies for each museum, ensure state support and promote the improvement of the qualifications of specialists in the field of culture. Attention should be focused on the formation of new business models that take into account the peculiarities of the digital environment, as well as the development of effective mechanisms for the preservation and dissemination of cultural heritage. In parallel with this, an important aspect is the development of appropriate legal mechanisms and terminological consistency for effective functioning in the conditions of digital transformations. This requires an integrated approach that covers technological, cultural and legal aspects to create a sustainable and innovative environment in the modern cultural and artistic area. Therefore, a strategic vision and state support is absolutely necessary for the successful implementation of digital transformation in the field of art and culture, since such a comprehensive approach takes into account technological, cultural and legal challenges, ensuring the effective development of the modern cultural and artistic sphere and emphasizes the importance of theoretical understanding of dynamic processes in digital culture to promote creative industries as a key component of the cultural sphere.

REFERENCES

- Antonova, L., Hololobov, S. (2023). Tsyfrova transformatsiia muzeinoi spravy: vyklyky ta mozhlyvosti dlia derzhavnoi polityky u sferi kultury. *Publichne upravlinnia ta rehionalnyi rozvytok*. № 20. S. 303-329. <https://doi.org/10.34132/pard2023.20.02> (In Ukrainian)
- Bannikova, K., Fryz, P., Voronova, N., Bondarenko, A., & Bilozub, L. (2023). Digital transformations in culture and art: new opportunities and challenges. *Amazonia Investiga*, 12(61), 348-358. <https://doi.org/10.34069/AI/2023.61.01.35>
- Bondar, A., Komarovskiy, V., Shobyk, V., Yatsenko, V. (2021). Menedzhment protsesiv tsyvrovoi transformatsii u sotsiokulturnii sferi. *Aktualni problemy derzhavnoho upravlinnia*, 3(84), 66-72. <https://doi.org/10.35432/1993-8330appa3842021246259> (In Ukrainian)

- Holovko, O.M. (2019). Tsyfrova kultura ta informatsiina kultura: prava liudyny v epokhu tsyfrovyykh transformatsii. *Informatsiia i pravo*. № 4. S. 37-44. [https://doi.org/10.37750/2616-6798.2019.4\(31\).196663](https://doi.org/10.37750/2616-6798.2019.4(31).196663) (In Ukrainian)
- Hudzenko, O. (2023). Samopiznannia ta dukhovni poshuky v konteksti vidrozhennia ukrainskoi natsionalnoi svidomosti: istoryko-filosofski doslidzhennia v umovakh tsyfrovizatsii suspilstva. *Tsyfrova transformatsiia ta dydzhytal tekhnolohii dlia staloho rozvytku vsikh haluzei suchasnoi osvity, nauky i praktyky*: Conf. Papers, 26.01 2023. Lomzha, RP. Ch. 1. S. 252-255. (In Ukrainian)
- Mezei, P. (2010). Digital Technologies – Digital Culture. *Nordic Journal of Commercial Law-issue*. 2010#1. Pp. 1-25. https://www.researchgate.net/publication/228260563_Digital_Technologies_-_Digital_Culture#fullTextFileContent
- Nikitin, Yu, Kulchytskyi, O. (2019). Tsyfrova paradyhma yak osnova vyznachen: tsyfrovyy biznes, tsyfrove pidpriemstvo, tsyfrova transformatsiia. *Marketynh i tsyfrovi tekhnolohii*. Tom 3, № 4. S. 77-87. <https://doi.org/10.15276/mdt.3.4.2019.7> (In Ukrainian)
- Oryshchuk, V. (2023). Katehoriiniy aparat u sferi tsyfrovoho rozvytku. *Publichne upravlinnia ta mytne administruvannia*. № 1 (36). S.94-103. (In Ukrainian)
- Pletsan, Kh. (2022). Novi mozhlyvosti ta perspektyvni tsyfrovi transformatsii v rozvytku kreatyvnykh industrii. *Tsyfrovi transformatsii v osviti, kulturi ta mystetstvi: novi mozhlyvosti y dosvid: materialy vseukrainskoho naukovo-pedahohichnoho pidvyshchennia kvalifikatsii*, 12.09 – 23.10. 2022. Odesa : Vydavnychiy dim «Helyetyka». C.83-88. (In Ukrainian)
- Strutynska, I. (2019). Definityni poniattia «tsyfrova transformatsiia». *Prychornomorski ekonomichni studii*. Vypusk 48-2. S.91-96 <https://doi.org/10.32843/bses.48-47> . (In Ukrainian)
- Uvarova, T. (2023). *Kulturna identychnist ta tsyfrove seredovyshche buttia kultury*. Riga, Latvia : «Baltija Publishing». Pp.297-317. (In Ukrainian)
- Uzelac, Aleksandra (ed.) and Cvjetieanin, Biserka (ed.) (2008). *Digital Culture: The Changing Dynamics*. Institute for International Relations. Zagreb. 203 p.
- Wright David (2022). How culture became digital: editor's introduction, *International Journal of Cultural Policy*, 28:7, 777-785, <https://doi.org/10.1080/10286632.2022.2137160>
- Yakushko, I. (2021). Sutnist ta osoblyvosti tsyfrovoy transformatsii. *Problemy i perspektyvy ekonomiky ta upravlinnia*. № 4(28). S. 75-82. <http://ppeu.stu.cn.ua/article/view/262608> (In Ukrainian)

Цифрова трансформація в культурі: реалії сьогодення та перспективи розвитку

Олена Гудзенко (0000-0003-2028-7697)

Волинський національний університет імені Лесі Українки (Україна)

Стаття присвячена інноваційним аспектам цифрової трансформації у сфері культури. Автор досліджує вплив нових продуктів, інноваційних бізнес-моделей та цифрових технологій на сучасний культурний ландшафт. Особлива увага приділяється ролі цифрових платформ у взаємодії сфери обміну цінностями та інформацією в контексті цифрового мистецтва. У статті відзначається, що цифрова трансформація стає ключовим каталізатором інновацій у культурно-мистецькому середовищі, створюючи можливості для збереження та популяризації національних культурних цінностей. Автор розглядає різні підходи до цифрової трансформації, враховуючи як стратегічне партнерство та комплексний підхід, так і динаміку взаємодії технологій, напрямків та учасників у процесі досягнення нових форм діяльності та підвищення ефективності у бізнесі. Окрім того, у статті висвітлюються проблеми, що виникають під час цифрової трансформації об'єктів мистецтва та культурної спадщини, зокрема, такі, як забезпечення майнових та авторських прав, а також неузгодженість термінології між інформаційною та цифровою культурами. Автор вказує на необхідність нового наукового дискурсу щодо цифрових прав для успішної реалізації цифрової трансформації у сфері культури в Україні. У статті розглядаються індивідуальні виклики та перспективи цифрової трансформації для музейної галузі, а також підкреслюється необхідність створення необхідних умов для кожного музею окремо. Автор досліджує вплив цифрових технологій на музейну сферу, надаючи конкретні приклади впровадження інновацій (створення музейних цифрових колекцій, віртуальних експозицій та турів). Виходячи з актуальності цифрової трансформації в сучасному світі, звертається увага на необхідності підвищення кваліфікації та обізнаності фахівців у галузі культури для успішного впровадження цифрових ініціатив.

Ключові слова: цифрова трансформація, культурна сфера, цифрові технології, інновації, цифрові права.

Received (Надійшла до редакції): 11.10.2023,

Accepted (Прийнята до друку): 15.12.2023

Available online (Опубліковано онлайн) 25.12.2023