

Advancing Ukrainian education in times of military conflict



Oleksandr Kaplia^a   | Yulia Ribtsun^b  | Iryna Barbashova^c  | Mariia Chobaniuk^d  |
Olena Ptashchenko^e 

^aInterregional Academy of Personnel Management, Kyiv, Ukraine.

^bDepartment of Speech Therapy, Mykola Yarmachenko Institute of Special Pedagogy and Psychology of the National Academy of Pedagogical Sciences of Ukraine, Kyiv, Ukraine.

^cFaculty of Psychological and Pedagogical Education and Arts, Berdyansk State Pedagogical University, Berdyansk, Ukraine.

^dDepartment of English Language and Methods of its Beginning, Faculty of Ukrainian and Foreign Philology, Drohobych Ivan Franko State Pedagogical University, Drohobych, Ukraine.

^eDepartment of Entrepreneurship and Trade, West Ukrainian National University, Ternopil, Ukraine.

Abstract The deepening of the conflict in Ukraine and the imposition of martial law have had a devastating impact on the country's social environment as well as its economic infrastructure. The education sector is one of the most war-affected areas in Ukraine, which currently faces new challenges that should be studied in order to explore the existing experience of anti-crisis management of educational institutions and search for ways to optimize the situation. The purpose of the academic paper is to distinguish the features of education in Ukraine in the context of military operations in Ukraine, and to characterize the main aspects that should be taken into account when organizing educational activities during the period of military invasion. In the course of the present research, induction, deduction, analysis, synthesis of information, system-structural, comparative, logical and linguistic methods, abstraction, and idealization were used to study and process data. At the same time, the analytical and bibliographic method was applied to study the scientific literature on developing the educational system during military incursion. By the way, the research authors also conducted a questionnaire in online mode to practically clarify the most significant issues related to the research topic. Based on the research results, the main and most important theoretical characteristics of the educational process during the war were established. Along with this, the viewpoints of scientists and educators on key aspects of the outlined issue were investigated.

Keywords: functioning of the educational system, military incursion, educational process, training in war conditions, relocation of educational institutions, improving the effectiveness of education

1. Introduction

Since the start of the military incursion in Ukraine, ensuring access to education for Ukrainian students and teachers has become significantly more urgent, disrupting the educational process. As a result of the intensification of hostilities, the right of every citizen to education, guaranteed by Article 53 of the Constitution of Ukraine, has been jeopardized. The complete or partial destruction of higher educational institutions has led to the suspension of the educational process. Although a significant number of them have gradually resumed the educational process and successfully conducted admission campaigns, the issue of the effectiveness of developing the educational system under the current conditions is extremely relevant and deserves comprehensive study.

The theoretical part of the present research substantiates the major features of educational organizations in Ukraine during the war and provides a brief overview of the challenges of the educational system.

The practical part of the research includes an assessment of the areas of managing the educational process that requires the most attention and intensification of measures to optimize them in connection with the military incursion, tools that contribute to improving the effectiveness of education during the war. Moreover, it comprises key issues, the resolution of which is a prerequisite for the successful organization of educational activities during hostilities.

Based on the research results, conclusions were drawn regarding the issues raised. In particular, it has been established that currently, first and foremost, efforts to optimize the management of the educational process are aimed at maintaining the safety and material support of educational institutions. At the same time, the primary issues that need to be addressed as a matter of priority for the successful organization of educational activities during the war are monitoring the administrative sphere of educational institutions, organizing the current educational process and recruiting personnel in educational institutions.



2. Literature Review

Distance learning makes it possible to organize the educational process in wartime conditions in a large part of the territory of Ukraine. At the same time, some students and teachers are in dangerous areas, namely, in combat zones or temporarily occupied territories. Consequently, they are unable to join the educational process since teachers and students who are relatively safe may not have access to the Internet or lack technical means. In most regions of Ukraine, an air raid alert is triggered daily (many several times a day), during which it is necessary to seek shelter. This directly affects the organization and quality of the educational process and interrupts it (Zinchenko *et al.*, 2022; Sotnik *et al.*, 2022; Norström *et al.*, 2020; Schneider *et al.*, 2021).

Collecting data and developing recommendations at the national and global levels on organizing the educational process under martial law can be useful for all training participants. During the war, new factors emerged affecting the educational process, including the need to go to a shelter during classes, the loss of material and technical facilities by some educational institutions, and the special psychological state of students during the war (caused by participation in or observation of hostilities, the presence of missing, wounded, or dead families of students and teachers, evacuation of some students and teachers, mobilization, active volunteer work of teachers and students, etc.). It is evident that reducing the impact of these elements on the learning process is vital for preventing the quality of education from declining (Yovenko *et al.*, 2021; Kretzmer & Ronen, 2021; Pinkovetskaia *et al.*, 2020).

Since the start of the extensive military incursion, Ukrainian education and our country as a whole have had to address incredibly challenging tasks: how to keep calm and motivated to work and study; how to acquire new knowledge, skills and abilities; and how to help students who are displaced. Despite the complexity of the situation, scientists and teachers continue their pedagogical, scientific, methodological, and organizational activities in the field of education and science (Darden, 2023; Gaid *et al.*, 2022; Miller & Wyborn, 2020; Ribtsun, 2023).

Currently, given that Ukraine is taking steps toward integration into the European Union, joint projects and studies with foreign higher educational institutions, international financial and educational organizations play an important role in renovating the educational system.

The purpose of this research is to determine the standpoints of scientists, teachers and heads of educational institutions on the features of organizing the educational process in Ukraine in the context of military incursion, as well as the key issues that should be addressed for the successful organization of educational activities during the war.

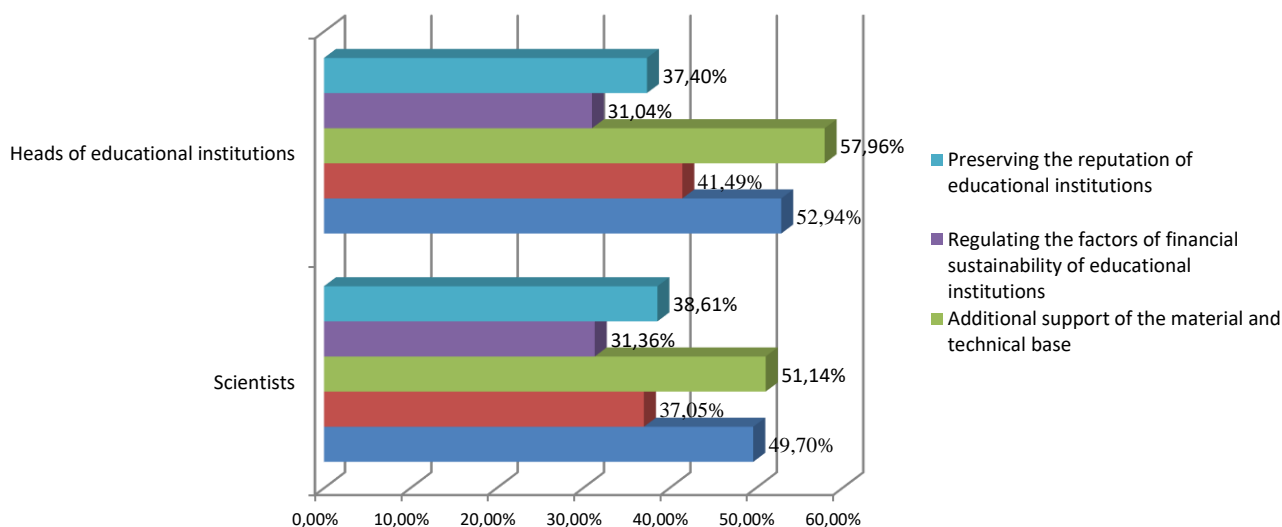
3. Methods

The practical aspects of organizing the educational process in Ukraine in the context of military incursion were studied by interviewing 64 scientists and 152 teachers from 17 higher and secondary education institutions in the Poltava, Cherkasy, Zhytomyr and Kyiv regions of Ukraine. The study was conducted in 2023 in online mode using the Survey Nuts service.

4. Results

To answer the question about the most significant vectors of educational process management activities requiring the most intensive attention and intensification of measures to optimize them in connection with the military incursion, the survey participants identified the most significant and characterizing the current situation (Figure 1).

Figure 1 Areas of activity in managing the educational process requiring the most attention and intensification of measures to optimize them in connection with the military incursion in Ukraine, %.



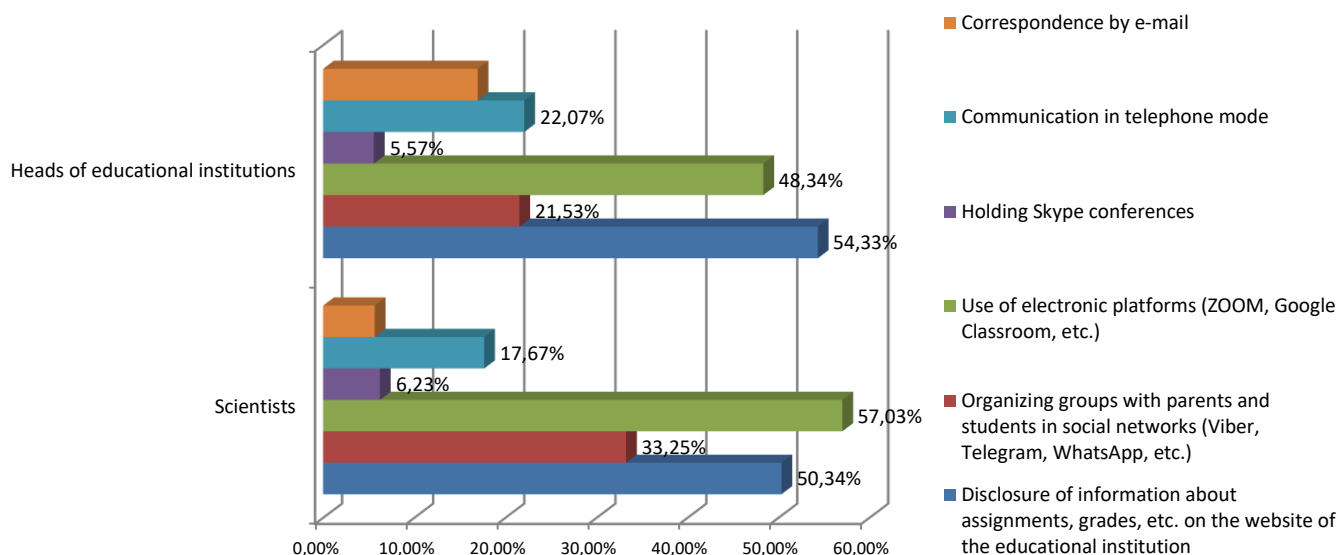
Source: compiled by the authors.



According to the survey results, the main vectors of efforts to optimize the management of the educational process requiring the most attention are the safety and material support of educational institutions.

The respondents' answers obtained in the survey made it possible to identify tools that contribute to improving the effectiveness of education during the war and were most in demand in organizing the educational process at all levels of the educational system (Figure 2).

Figure 2 The tools contributing to the effectiveness of education during the war and proving to be the most important for organizing the educational process, %.

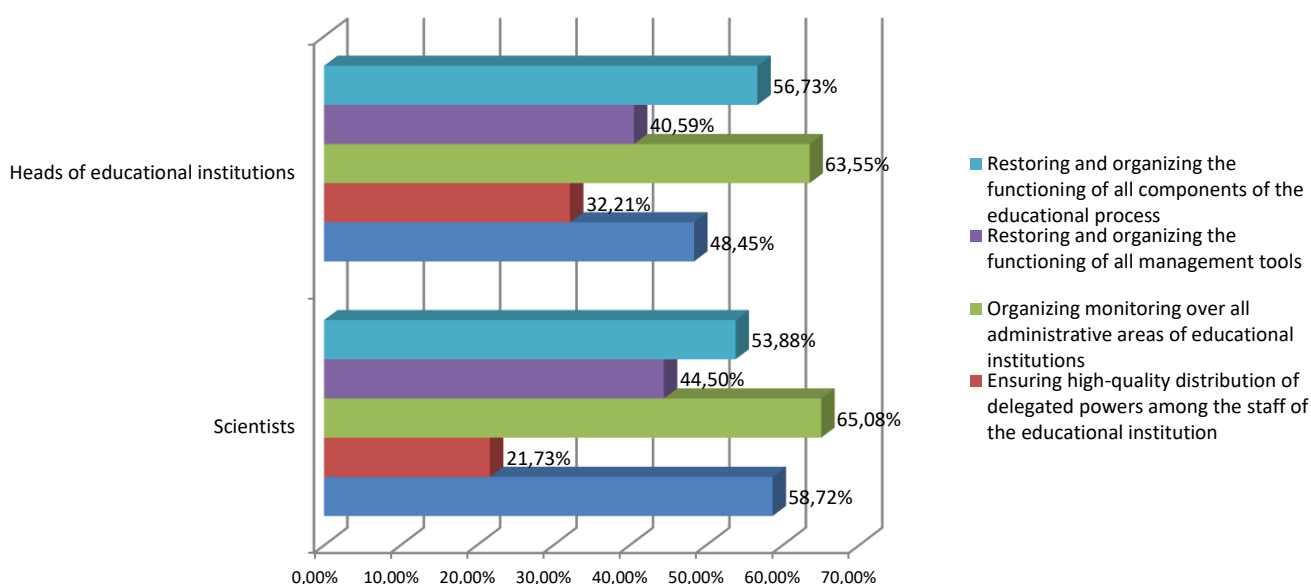


Source: compiled by the authors.

As shown in Figure 2, the most effective resources for improving the effectiveness of education during the war are electronic platforms and posting information on education on the website of an educational institution.

Based on the survey results, the key issues that need to be addressed for the successful organization of educational activities during the war were identified (Figure 3):

Figure 3 Key issues, the resolution of which is a primary prerequisite for the successful organization of educational activities during the war, %.



Source: compiled by the authors

Thus, the key aspects that should be addressed as a matter of priority for the successful organization of educational activities during the war are monitoring the administrative sphere of educational institutions, organizing the current educational process and recruiting staff for educational institutions.



5. Discussion

Currently, Ukraine has been going through a brutal and unique path in its struggle for freedom and independence. Relocated and reorganized educational institutions, similar to those in the rest of Ukraine, are gaining experience in new locations without specific official support, which is atypical for most universities worldwide (Anishchenko *et al.*, 2022; Lim *et al.*, 2022; Akimov *et al.*, 2020).

A secure learning environment is created for the educational process participants in the Donetsk, Luhansk, Kherson regions, as well as other particular regions, under the terms of martial law in response to the armed aggression of the Russian Federation against Ukraine and to safeguard the lives and health of Ukrainian citizens (Shumilova *et al.*, 2022; Kaarbo, Oppermann & Beasley, 2023).

According to the Ministry of Education and Science of Ukraine, as of the end of September 2022, 30 higher educational institutions and 44 vocational higher educational institutions were operating in the Zaporizhzhia and Kharkiv regions, where active hostilities have been ongoing, and 65 separate structural units of vocational higher educational institutions of municipal and private ownership were temporarily displaced.

The forced choice of relocating educational institutions became a challenge for any educational institution that had to organize its activities in a new region and a test of the maturity of such educational institutions' management teams. Notably, the external environment has had a detrimental effect on the academic community in recent years (Bakhov *et al.*, 2020). The fragmentation of regulatory and supportive factors does not produce the expected effect due to the lack of a systemic educational policy focused on the innovation imperative (Kempe, 2022; Landler, Bennhold & Stevis-Gridneff, 2022; Ribtsun, 2022).

When conducting a management audit and forming the management team of universities, another problem for institutions that have changed their location is to revise the university's mission and approaches to organizing management (Heinicke & Guenther, 2020; Filali, Benabdelkrim & Hassainate, 2018; Martin-Sardesai *et al.*, 2019).

Currently, collegiality in managing educational institutions and the introduction of corporate governance elements through developing a quality management system is an important requirement. This will make it possible for higher education institutions to implement the autonomy of higher education, increase investment attractiveness, strengthen their competitiveness in the global market of educational services and gain recognition among consumers of educational services (Kumar, Shukla & Passey, 2021; Bobe & Kober, 2020).

The system of managing education quality provides for the reduction of administrative and managerial verticals in higher educational institutions. It is implemented by involving all staff in developing management practices in the areas of forming education content in accordance with market needs, improving the quality of basic and additional educational services aimed at restoring the national economy of Ukraine and its regions, organizing research and commercialization of science, social and educational work, administrative activities, legal support, financial stability, information and communication optimization (Pilonato & Monfardini, 2020; Xie, 2019; Khalid *et al.*, 2018; Duszczak & Kaczmarczyk, 2022).

Organizational changes have affected all levels of the Ukrainian education system, from preschool to higher education, which has become a serious challenge for managers and teaching staff (Kryshtanovych *et al.*, 2022). However, the teachers made every effort to stabilize the educational process and ensure a successful start to the new school year. Not all educational institutions were able to continue their studies because of a number of negative factors, namely, destruction and damage to premises, occupation, active hostilities, rocket attacks, reorientation of educational institutions to social and humanitarian aid centers for internally displaced persons, etc. It is also important to note that not all preschool educational institutions are operating as usual; some have closed, some are temporarily accepting IDPs, some manage the educational process remotely, some consult with parents, etc. (Díaz-García *et al.*, 2022; Tømte *et al.*, 2019; Levitt, 2018).

The way that personnel work is organized has changed as a result of martial law, particularly in terms of professional development, knowledge, and methodological support for educators. Feelings of anxiety, tension, fear, and uncertainty complicate children's full socialization.

6. Conclusions

Thus, the analysis of the scientific literature on the research topic and the questionnaire results showed that against the background of new serious challenges in 2020-2022 caused by the pandemic and military aggression of the Russian Federation, the academic community of Ukraine is experiencing crisis phenomena that make it impossible to adapt and evolve. Those educational institutions recognizing this currently and having the potential and courage to respond to today's challenges, to concentrate resources and take risks, and to choose effective innovative solutions will have significant opportunities for development in the period of postwar reconstruction. In accordance with the research purpose set at the beginning of the scientific work, the theoretical features of organizing and developing the educational process in Ukraine are highlighted, and some practical aspects of this issue are outlined. Therefore, the purpose of the academic paper has been achieved. The organizational transformation of the educational process in Ukraine after the start of the full-scale military incursion affected institutions of all educational levels. In particular, many educational institutions are recommended to start the educational process in regions where the security situation enables distance or blended learning.

Ethical considerations

We confirm that we have obtained all consent required by the applicable law to publish any personal details of the research subjects. We agree to provide the Multidisciplinary Science Journal with copies of the consent or evidence that such consent has been obtained if requested.

Conflict of Interest

The authors declare no conflicts of interest.

Funding

This research did not receive any financial support.

References

- Akimov, O., Troschinsky, V., Karpa, M., Ventsel, V., Akimova, L. (2020). International experience of public administration in the area of national security. *Journal of Legal, Ethical and Regulatory*, 23(3), 1-7.
- Anishchenko, V., Vdovenko, I., Tretyak, O. & Chebonenko, S. (2023). Full-scale military invasion of the Russian Federation of Ukraine as a factor of social transformations in higher education. *Revista Amazonia Investiga*, 12, 61, 287-296. https://www.researchgate.net/publication/369929797_Full-scale_military_invasion_of_the_Russian_Federation_of_Ukraine_as_a_factor_of_social_transformations_in_higher_education
- Bakhov, I., Opolska, N., Bogus, M., Anishchenko, V., Biryukova, Y. (2021). Emergency distance education in the conditions of COVID-19 pandemic: Experience of Ukrainian universities. *Education Sciences*, 11(7), 364.
- Bobbe, B. J. & Kober, R. (2020). University Dean Personal Characteristics and Use of Management Control Systems and Performance Measures. *Studies in Higher Education*, 45, 235-57. <https://www.tandfonline.com/doi/full/10.1080/03075079.2018.1504911>
- Darden, J. T. (2023). Ukrainian wartime policy and the construction of women's combatant status. *Women's Studies International Forum*, 96, 102665. <https://www.sciencedirect.com/science/article/pii/S0277539522001066>
- Díaz-García1, V., Montero-Navarro, A., Rodríguez-Sánchez, J. L. & Gallego-Losada, R. (2022). Digitalization and digital transformation in higher education: A bibliometric analysis. *Frontiers in Psychology*, 13. <https://www.frontiersin.org/articles/10.3389/fpsyg.2022.1081595/full>
- Duszczek, M. & Kaczmarczyk, P. (2022). The War in Ukraine and Migration to Poland: Outlook and Challenges. *Intereconomics*, 57, 3. <https://www.intereconomics.eu/contents/year/2022/number/3/article/the-war-in-ukraine-and-migration-to-poland-outlook-and-challenges.html>
- Filali, E., Benabdelkrim, Y. & Hassainate, M. S. (2018). The Contribution of Management Control to the Improvement of University Performance. *Journal of North African Research in Business*, 842469. <https://ibimapublishing.com/articles/JNARB/2018/842469/>
- Gaind, N., Abbott, A., Witze, A., Gibney, E., Tollefson, J., Irwin, A. & Noorden R. (2022). How the war in Ukraine is changing global science. *Nature*, 607, 440-443. <https://www.nature.com/articles/d41586-022-01960-0>
- Heinicke, X. & Guenther, T.W. (2020). The Role of Management Controls in the Higher Education Sector: An Investigation of Different Perceptions. *European Accounting Review*, 29, 581-630. <https://www.tandfonline.com/doi/full/10.1080/09638180.2019.1619603>
- Kaarbo, J., Oppermann, K. & Beasley, R. K. (2023). What if? Counterfactual Trump and the western response to the war in Ukraine. *International Affairs*, 99, 2, 605-624. <https://academic.oup.com/ia/article/99/2/605/7069031>
- Kempe, F. (2022). The western response to Putin's war has been remarkable. But it's not enough, *Atlantic Council*, 13. <https://www.atlanticcouncil.org/content-series/inflection-points/the-western-response-to-putins-war-has-been-remarkable-but-its-not-enough/>
- Khalid, J., Ram, B.R., Soliman, M., Ali, A.J., Khaleel, M. & Islam, M. S. (2018). 'Promising digital university: a pivotal need for higher education transformation'. *International Journal of Management in Education*, 12, 3, 264-75. <https://www.tandfonline.com/servelet/linkout?suffix=CIT0025&dbid=16&doi=10.1080%2F13538322.2019.1603611&key=10.1504%2FIJMIE.2018.092868>
- Kretzmer, D. & Ronen, Y. (2021). International human rights law. The Occupation of Justice. *Oxford University Press*, 83-98. <https://academic.oup.com/book/39622/chapter-abstract/339564228?redirectedFrom=fulltext>
- Kryshchanovych, M., Akimova, L., Akimov, O., Parkhomenko-Kutsevill, O., & Omarov, A. (2022). Features of creative burnout among educational workers in public administration system. *Creativity Studies*, 15(1), 116-129. <https://doi.org/10.46502/10.3846/cs.2022.15145>
- Kumar, P., Shukla, B. & Passey, D. (2021). Impact of Accreditation on Quality and Excellence of Higher Education Institutions. *Investigacion Operacional*, 41, 2, 151-167. https://www.researchgate.net/publication/350108789_Impact_of_Accreditation_on_Quality_and_Excellence_of_Higher_Education_Institutions
- Landler, M., Bennhold, K. & Stevis-Gridneff, M. (2022). How the West marshaled a stunning show of unity against Russia, *New York Times*, 5 March 2022. <https://www.nytimes.com/2022/03/05/world/europe/russia-ukraine-invasion-sanctions.html>
- Levitt, H. M. (2018). How to conduct a qualitative meta-analysis: Tailoring methods to enhance methodological integrity. *Review PMID*, 28, 3, 367-378. <https://www.tandfonline.com/doi/full/10.1080/10503307.2018.1447708>
- Lim, C. K., Haufiku, M. S., Tan, K. L., Farid Ahmed, M. & Ng, T. F. (2022). Systematic Review of Education Sustainable Development in Higher Education Institutions. *Sustainability*, 14, 13241. <https://doi.org/10.3390/su142013241>
- Martin-Sardesai, A., Guthrie, J., Tooley, S. & Chaplin, S. (2019). History of Research Performance Measurement Systems in the Australian Higher Education Sector. *Accounting History*, 24, 40-61. <https://journals.sagepub.com/doi/10.1177/1032373218768559>
- Miller, A. & Wyborn, C. (2020). Co-production in global sustainability: Histories and theories. *Environmental Science & Policy*, 113, 88-95. <https://linkinghub.elsevier.com/retrieve/pii/S1462901117306366>
- Norström, V. et al. (2020). Principles for knowledge co-production in sustainability research. *Nature sustainability*, 3, 182-190. <https://www.nature.com/articles/s41893-019-0448-2>
- Pilonato, S., & Monfardini, P. (2020). Performance Measurement Systems in Higher Education: How Levers of Control Reveal the Ambiguities of Reforms. *The British Accounting Review*, 52, 100908. <https://www.sciencedirect.com/science/article/abs/pii/S0890838920300287?via%3Dihub>

- Pinkovetskaia, I., Arbeláez-Campillo, D., Rojas-Bahamón, M., Novikov, S. & Veas Iniesta, D. (2020). Social values of entrepreneurship in modern countries. *Amazonia Investiga*, 9, 28, 6-13. <https://amazoniainvestiga.info/index.php/amazonia/article/view/1276/1147>
- Ribtsun, Y. (2023). *Psychological and pedagogical support of children with stuttering in war conditions*. K.: FOP Tsybulska V. O., 132 p. <https://lib.iitta.gov.ua/739023/>
- Ribtsun, Yu. V. (2022). *Neuropsychological approach in working with children with stuttering. Overcoming psychotrauma caused by military actions. Modern technologies for solving actual society's problems*. Publishing House of University of Technology, Katowice, pp. 113-120. <https://lib.iitta.gov.ua/id/eprint/732106>
- Schneider, F. et al. (2021). Co-production of knowledge and sustainability transformations: A strategic compass for global research networks. *Current Opinion in Environmental Sustainability*, 49, 127-142. <https://linkinghub.elsevier.com/retrieve/pii/S1877343521000646>
- Shumilova, O., Tockner, K., Sukhodolov, A., Khilchevskyi, V., De Meester, L., Stepanenko, S., Trokhymenko, G., Hernández-Agüero, J.A. & Gleick, P. (2023). Impact of the Russia–Ukraine armed conflict on water resources and water infrastructure. *Nature Sustainability*, 2. <https://www.nature.com/articles/s41893-023-01068-x>
- Sotnik, G. et al. (2023). How to help Ukrainian scientists overcome Russia's invasion and advance sustainability. *Sustainability Science*, 120, 6, e2219792120. <https://www.pnas.org/doi/10.1073/pnas.2219792120>
- Tømte, C. E., Fosslund, T., Aamodt, P. O. & Degn, L. (2019). Digitalisation in higher education: mapping institutional approaches for teaching and learning. *Quality in Higher Education*, 25, 98-114. <https://www.tandfonline.com/doi/full/10.1080/13538322.2019.1603611>
- Xie, J. (2019). Review of chinese and foreign management accounting research based on management accounting research topics and research methods. *Open Journal of Social Sciences*, 7, 107-119. <https://www.scirp.org/journal/paperinformation.aspx?paperid=96931>
- Yovenko, L., Novakivska, L., Sanivskyi, O., Sherman, M., Vysochan L. & Hnedko N. (2021). Pedagogical Analysis of The Phenomenon of Digital Competence. *IJCSNS International Journal of Computer Science and Network Security*, 21, 6, 7-10. <https://www.koreascience.or.kr/article/JAKO202121055603990.pdf>
- Zinchenko, V., Kaidanovska, O., Boyko, A., Potikha, O. & Chaika, S. (2022). Education and science of Ukraine in the realities of large-scale military aggression and global challenges of the 21st century. *Revista Eduweb*, 16, 2, 223-233. <https://revistaeduweb.org/index.php/eduweb/article/view/445>