DOI: https://doi.org/10.30525/2256-0742/2025-11-4-69-78

THE IMPACT OF THE RUSSIAN-UKRAINIAN WAR ON THE TRAINING OF FASHION INDUSTRY SPECIALISTS IN UKRAINE

Liliia Derman¹, Andriy Dyogtyev², Natalia Okhman³

Abstract. This article discusses the integration of the apparel industry into vocational and higher education systems in Ukraine. It analyses the main trends in co-operation between educational establishments and apparel industry enterprises, and determines the key areas in which educational programmes should be adapted to meet modern labour market requirements. It also outlines the advantages of dual education, industrial practices and internships as effective mechanisms for training industry professionals. It is imperative to emphasise the necessity to modernise the material and technical facilities of educational institutions. This can be achieved by attracting grant programmes, international financing, and partnerships with businesses. The role of enterprises in the development of educational initiatives is substantiated, in particular by investing in the development of laboratories, providing equipment, and conducting co-operative research. The research considers the current state of the apparel industry and its main challenges. These include a shortage of skilled personnel, educational programmes that do not meet the current requirements of the labour market, and low motivation among young people to pursue careers in this field. The authors propose ways to reform sectoral education, such as updating training laboratories, providing teaching staff with regular internships at production facilities, integrating digital technologies into the educational process and fostering public-private partnerships. This article analyses the impact of the Russian–Ukrainian war on training specialists for the fashion industry. It considers human resources challenges, the adaptation of educational programmes and the role of cultural diplomacy in supporting the industry. The paper also draws attention to the lack of mechanisms for state and business co-financing of education. This factor, in turn, complicates the training of highly qualified specialists. The authors suggest possible solutions to this problem, such as introducing tax incentives, developing dual education and attracting international support. Particular attention is also given to analysing the impact of the Russian-Ukrainian war on training fashion industry specialists, the co-operation mechanisms between educational institutions and apparel industry enterprises, the introduction of digital technologies, the development of dual education and the expansion of public-private partnerships. This research aims to identify effective ways to improve interaction between the apparel industry and vocational and higher education in Ukraine. It will also study the main challenges facing the industry and develop recommendations for modernising educational programmes to meet current labour market requirements. Methodology. The specifics of the research determined its methodological principles. The study employed methods such as analysis, synthesis and analogy, as well as comparative, historical and systematic approaches. This methodological background enabled changes in the training of fashion industry professionals in Ukraine to be compared under the impact of the Russian-Ukrainian war, while taking into account the historical, socio-cultural, and economic contexts. The surveys conducted as part of this study are based on data from professional associations, educational institutions, business representatives, and industry experts. Results. The results obtained can inform strategic decisions regarding the development of sectoral education, enhance interaction mechanisms between educational institutions and the production sector,

E-mail: liliya.derman@gmail.com

ORCID: https://orcid.org/0000-0001-7408-7645

ResearcherID: HOC-5050-2023

 $^{\rm 2}$ Dragomanov Ukrainian State University, Ukraine

E-mail: dyogtyev@gmail.com

ORCID: https://orcid.org/0009-0002-0800-4551

ResearcherID: NCV-0926-2025

³ Dragomanov Ukrainian State University, Ukraine E-mail: okhman.nata@gmail.com

ORCID: https://orcid.org/0009-0002-6810-9216 ResearcherID: NBY-3702-2025



¹ Dragomanov Ukrainian State University, Ukraine (corresponding author)

and inform policy to support the fashion industry during wartime. *Practical impact*. The key challenges caused by the outflow of personnel abroad are identified, and the prospects for reforming the educational system to adapt to the new situation are outlined. The main approaches to updating professional training are described, which could facilitate the restoration and development of the Ukrainian fashion industry, even during wartime. The *scientific novelty* of the research lies in a comprehensive analysis of approaches to the qualitative interaction of the apparel industry and the system of vocational and higher education in Ukraine in the context of modern economic and socio-cultural challenges. For the first time ever: the present study identifies and systematises the main trends in co-operation between educational institutions and apparel industry enterprises that contribute to effective personnel training in accordance with the needs of the labour market; the paper analyses the impact of the Russian-Ukrainian war on the training of specialists for the apparel industry, with particular reference to the challenges experienced by personnel, the need for adaptation of educational programmes, and the role of cultural diplomacy in supporting the industry.

Keywords: fashion industry, enterprises, designer brands, creative economy, relocation, re-profiling, investment, co-operation, sustainable development, apparel industry, Russian-Ukrainian war, education.

JEL Classification: C90, C92, I20, I21, I25, I26

1. Introduction

Notwithstanding the extremely challenging circumstances engendered by the Russian-Ukrainian war, the education system in Ukraine persists in functioning and is embarking on a process of recovery. Higher education institutions are engaged in efforts to establish effective mechanisms that ensure the continuity and quality of the educational process.

In the aftermath of the large-scale invasion by the Russian armed forces, the field of education, as a pivotal component of the social and humanitarian sphere and human capital, has undergone substantial changes and losses. A significant proportion of the infrastructure, encompassing educational institutions, communication networks, and material and technical facilities, was either damaged or completely destroyed. This resulted in the involuntary displacement of university students and schoolchildren to other regions of the country, primarily to the centre and west. Concurrently, the communities that have been affected and remain under Ukrainian control are compelled to source resources to facilitate the restoration of educational establishments.

Educational losses encompass more than just the material component. The most critical problems include the safety of participants in the educational process, the availability and functionality of infrastructure, human and technical resources to support the educational process in certain communities, and the psychological well-being of both educational personnel and students.

As of July 1, 2023, the Ministry of Education and Science of Ukraine reported that approximately 3,800 educational institutions had been impacted by the hostilities, marking a 42.1% increase compared to the previous year. Of these, 331 were completely destroyed and 3,450 sustained partial damage. In the aftermath of the disaster, a total of ten professional

pre-higher education institutions (PPHEI) and four higher education institutions (HEI) were completely destroyed. The total number of damaged higher education institutions and universities is 184. In the contemporary era, these figures have increased and continue to exhibit growth.

The situation is significantly complicated by the occupation of parts of Ukraine. Of the 108 vocational education and training (VET) institutions in the Donetsk, Luhansk, Zaporizhzhia and Kherson regions (oblasts), 70 are located in temporarily occupied areas. In fact, 55 of these institutions have been relocated to government-controlled areas of Ukraine.

The relocation of higher education institutions took place in 2023. This included 13 institutions from the Donetsk Oblast (two of which remained in the region), seven from the Luhansk Oblast, five from the Kherson Oblast, three from the Zaporizhzhia Oblast (all of which were located in Zaporizhzhia), and the V. I. Vernadsky Taurida National University from the Autonomous Republic of Crimea.

In light of the persistent threat of missile and drone attacks in a substantial portion of Ukrainian territory, there has been an observed increase in the number of applicants opting for regions considered to be relatively secure for academic pursuits. This concern is most prevalent in western regions, notably the Lviv region, where there has been a discernible increase in interest in applying to local higher education institutions. Concurrently, educational institutions situated in the central or eastern regions, particularly in the city of Kyiv, are experiencing a decline in prospective applicants.

Consequently, there is an imbalanced distribution of the student population, which places an excessive burden on the infrastructure of some higher education institutions in the western part of the country. This predicament assumes particular significance

within the context of design education institutions, where the paucity of physical and human resources often hinders the capacity to deliver a high-quality educational experience to the growing number of students. Such disparities have repercussions for the efficiency of the educational process and the opportunities for further development of the universities themselves, which are compelled to adapt to new challenges without adequate funding and support from the authorities.

The repercussions of the full-scale invasion of Ukraine are felt across all areas of public life, including education, the economy, social policy and enterprise management. A 2020 study by the Organisation for Economic Co-operation and Development (OECD) showed the serious long-term effects of temporary educational disruption, even before the outbreak of war. The study found that students affected by educational disruption could lose at least 2.6% of their potential lifetime income. In economic terms, this equates to a reduction in the country's total GDP and economic potential.

As a consequence of the ongoing war, the predictions regarding educational losses have become even more realistic. According to estimates by the World Bank, the current educational losses suffered by Ukrainian schoolchildren have the potential to result in a loss of 5.5 billion USD over the course of their working lives. Furthermore, a 20-week absence from education is equivalent to one academic year's learning.

This is not merely an educational challenge; it signifies a critical issue concerning the maintenance and restoration of the state's social and humanitarian capital. The loss of access to quality education has been demonstrated to diminish the capacity of future workers to adapt to innovative markets, to hinder labour mobility, and to restrict entrepreneurship development.

Nevertheless, the Ukrainian education system has demonstrated resilience and adaptability in the face of war. Despite the significant losses incurred, the educational infrastructure is gradually being restored, and institutions are continuing to reorganise and adapt to the new operating environment.

Like many other creative economy segments, Ukraine's fashion industry has been severely damaged by the full-scale invasion. The destruction of logistics chains, unstable energy supplies, restrictions on physical access to training and production sites, and the mass migration of specialists have all had a dramatic impact on the fashion sector.

The business strategies of Ukrainian brands are changing. Some are moving to digital formats, such as online sales, virtual shows and 3D design, while others are relocating production to safer regions or seeking partnerships abroad. These adaptation processes require specialists to have new skills: the ability to

work with digital platforms, manage remote teams and communicate with international markets while taking into account the cultural sensitivity of Ukrainian design in wartime.

In times of war, the management of fashion enterprises is based on anti-crisis approaches, such as minimising costs and quickly refocusing on new target audiences (e.g., the Ukrainian diaspora abroad), as well as introducing the principles of sustainable fashion and local production. Therefore, specialist training programmes should reflect these new realities by focusing not only on creativity, but also on strategic thinking, flexibility and crisis management.

From a social policy perspective, unequal access to education is one of the biggest problems. Only a few educational institutions provide adequate shelter and conditions for safe learning. This is a particularly critical issue in the fashion industry, where most disciplines require hands-on work with materials, machinery and specialised equipment.

The need to quickly update programmes in vocational and higher education to reflect new realities is becoming increasingly apparent. In particular, fashion professionals should be prepared to design clothing for military purposes, such as tactical equipment and thermal underwear, as well as participating in humanitarian projects and designing symbolic garments that represent national identity on the international stage.

Consequently, the war is having a profound impact on various aspects of the fashion industry, including the economy, business models and the very essence of professional training. The objective is to cultivate a universal, multifunctional professional who is capable of combining creativity with entrepreneurship and civic responsibility.

The apparel industry is one of the leading sectors of Ukraine's economy, contributing to the growth of employment, the development of the industry's export potential, and actively influencing the formation of an innovative social and cultural environment.

The current challenges facing Ukraine's apparel industry require improvements to vocational education, as well as closer interaction between education and production. The mismatch between enterprises' demand for qualified personnel and graduates' level of training creates a shortage of specialists. This undermines the industry's competitiveness. The problem is exacerbated by war, rapid technological development and automation, as well as the need to update educational programmes to meet market demands. Therefore, there is a need for dual education to be more actively integrated into the educational process, and for educational institutions to co-operate with enterprises. This will help improve the training of specialists.

The situation is further complicated by the outflow of human resources from both the production sector and the academic and teaching environment abroad, which has been caused by the Russian-Ukrainian war. The involuntary displacement of highly skilled workers and educators, who historically supplied training for the apparel industry, has precipitated a pronounced exacerbation of the existing staff deficit. This has a detrimental effect on enterprises' ability to adapt to modern challenges and complicates the process of updating educational programmes in line with changes in the labour market. Consequently, the establishment of an effective system of interaction between education and production, as well as the development of strategies for the maintenance and development of human resources, is of particular relevance for the sustainable development of the Ukrainian apparel industry.

According to the Confederation of Employers of Ukraine, the country has lost more than 30% of its labour force as a result of the war. Meanwhile, statistics from the State Employment Service show that the labour market is experiencing the highest demand for blue-collar jobs, including apparel workers (sewers).

A persistent challenge pertains to the inadequate level of collaboration between vocational education institutions and enterprises. At present, employers are not always prepared to accept underage students for internships due to the necessity for additional time, resources, and guidance on production processes. However, the expansion of the network of internship bases is of crucial importance for the formation of competent specialists who will not require additional training after graduation.

Furthermore, strengthening the skills of teaching staff and vocational training instructors by involving them in practical training at real enterprises is an integral part of vocational education development. This will help to reduce the gap between theoretical training and the practical needs of production.

Two-way knowledge diffusion is needed: business representatives should be able to participate in teaching, while educators should have access to modern technologies and production processes.

2. The Impact of the Russian-Ukrainian war on the Training of the Apparel Industry Specialists

Globalisation and technological advancement are creating new demands for specialist training, necessitating a re-evaluation of approaches to organising the educational process. The future of industry-specific education hinges on integrating innovative teaching methods and modern technologies,

as well as adjusting educational programmes to align with labour market needs.

Key challenges facing the industry include outdated equipment, limited access to financing for production modernisation and a shortage of highly qualified specialists.

The intensifying global competition, particularly from Asian producers, necessitates the enhancement of the competitiveness of Ukrainian products and the integration of innovations into production processes.

Apparel enterprises are struggling to find qualified specialists with vocational qualifications. Furthermore, some employees may be working without the necessary legal certification, which complicates the state's regulation of employment and social protection. This issue is particularly prevalent among small and medium-sized enterprises.

1. The current labour market demands more specialists who are skilled in modern technologies, such as production automation and computer-aided design (CAD) systems. Businesses require sewing personnel, as well as designers, fashion constructors and technologists. Unfortunately, educational programmes do not fully align with current market demands, resulting in a mismatch between graduates' training and employers' needs (School of sewing skills, 2025).

Addressing this issue requires close collaboration among educational institutions, industries, and companies.

A major issue is the lack of co-operation between educational institutions and businesses, which has a negative impact on the quality of training in design and apparel production. Many companies, for example, are reluctant to hire students and graduates without practical experience, as integrating them into production processes requires significant resources. As well as basic skills, young professionals need to master specific technological processes and company requirements, which takes up extra time and effort on the part of experienced employees and management.

As the labour market evolves, presenting new opportunities within various companies and industries, organisations often face uncertainty over whether young employees will stay with them after completing an internship or their first job. Consequently, there is a significant risk that the resources allocated to training young professionals will not produce the desired results.

Integrating CAD systems and other technologies into the educational process gives students the chance to learn about innovations that are actively used in enterprises, such as 3D modelling and automated systems for creating patterns and managing production. This integration helps to train highly qualified specialists. To further improve training, it is essential to promote closer collaboration between

educational institutions and businesses, for example by setting up joint training centres and organising joint events. Attracting more grants to upgrade facilities and research laboratories is also crucial. This will improve training quality and support the development of new technologies in partnership with public and private entities

In vocational schools and universities across Ukraine, training programmes for the apparel industry are predicated on traditional approaches, which do not consistently address the current challenges facing the labour market. According to the Ukrainian Institute of Information Technologies in Education, approximately 100 higher education institutions in Ukraine utilise various e-learning platforms, both free and commercial. However, there is a pressing need to enhance and further develop this process.

Consequently, a significant challenge lies in the discrepancy between the competencies sought by employers and the competencies imparted by training programmes. Graduates frequently demonstrate deficiencies in practical skills when operating contemporary equipment, which hinders their capacity to effectively transition into the labour market (Derman, Skovronskyi, Rusakov, 2023).

The introduction of dual education, enhanced collaboration with businesses, and the modernisation of human resource management approaches are crucial factors in bridging the existing gaps between students' theoretical training and the actual requirements of the production sector.

The efficacy of dual education in effectively bridging the gap between theory and practice is a subject that has been the subject of much debate. The experiences of EU countries demonstrate that collaboration between enterprises and educational institutions enables students to acquire practical skills while they study. In Ukraine, such initiatives are currently being tested but require further development.

This will facilitate the adaptation of best practices for dual education and the professional development of teaching staff, which will in turn enhance the quality of training in the apparel industry over time. Ukraine stands to benefit from the implementation of best practices observed in EU countries. The adaptation of this knowledge to suit Ukrainian contexts may require the establishment of joint projects with European universities. Moreover, it is imperative to facilitate the exchange of students and teaching staff to acquire international experience.

Direct interaction between enterprises and educational institutions through collaborative research, internships, and professional development constitutes a pivotal element of this strategy. Such collaboration enables both educators and students to gain practical insights into production conditions, thereby enhancing the quality of training

and facilitating better adaptation to workplace environments.

Enterprises have the capacity to play a significant role in modernising the materials and technical facilities of educational institutions, especially in research laboratories. This collaborative endeavour facilitates students' engagement in authentic research and development activities, addressing contemporary challenges and requisites in the domain of production.

Moreover, business investments in educational institutions can be strategically advantageous, fostering mutually beneficial collaboration that enhances the quality of training and establishes a genuine connection between educational outcomes and the needs of the industry (Derman, 2020).

A further advantage of such co-operation is that enterprises can develop specialised courses and workshops on educational platforms with the aim of cultivating the competencies required for prospective specialists. The integration of contemporary production technologies, innovations, and methodologies into the educational process has the potential to enhance students' knowledge and increase their competitiveness in the labour market (Ukrainian Fashion Council, 2025).

Today, a notable trend is emerging within the Ukrainian apparel industry: small enterprises are setting up training spaces. These initiatives focus on directly training and enhancing the skills of employees to meet specific production demands. In-house training platforms allow companies to cultivate the essential professional skills of new employees efficiently and swiftly, aligning them with the nuances of the production process, technological requirements and internal quality standards.

The development of such training formats is driven by several factors. The primary factor is the need for retraining. Many adult women seeking employment in the apparel industry encounter obstacles when trying to access vocational education institutions, often due to age restrictions and other issues. Furthermore, the current vocational education system often fails to provide sufficient applied training that aligns with contemporary production demands. In response to these challenges, apparel companies are increasingly implementing on-the-job training. This approach facilitates the swift fulfilment of staffing requirements while conserving resources for the long-term integration of new employees. The establishment of in-house training centres enables the development of flexible, modern training programmes that address real industry challenges, incorporate innovative technologies and reflect local labour market specifics. These training facilities are becoming an effective way for apparel enterprises to enhance professional mobility, adapt their personnel and ensure sustainable development in the manufacturing sector amid ongoing socio-economic changes.

A significant challenge in the realm of education is the prevalence of outdated materials and technical facilities in the laboratories of vocational schools and higher education establishments (Kucher, 2023). The equipment frequently fails to meet the contemporary standards required by the apparel industry. This hinders students' ability to acquire practical skills and decreases their competitiveness in the labour market.

It is evident that higher education institutions, even at the bachelor's level, are not consistently providing an adequate level of training. This is due to the fact that the education system is struggling to keep pace with technological advancements and market demands. The prevailing emphasis within these institutions is on theoretical disciplines, which has the effect of limiting practical training opportunities for students.

It is noteworthy that a number of young individuals endeavour to address these disparities autonomously by means of self-education or non-formal learning programmes. Nevertheless, this frequently gives rise to a discrepancy between their vocational aspirations and the actual demands of the labour market. This issue is especially evident in the design industry, which requires not only an understanding of fashion but also the capacity to adapt to rapidly evolving technologies, processes, and business models (Podolevskyi, 2024).

Contemporary youth frequently hold misconception that completing short-term design courses is sufficient for embarking upon a career in this domain, or indeed establishing their own enterprise. It is evident that such courses offer a foundation of essential skills and a comprehensive introduction to the fundamental principles of the profession, which is undoubtedly beneficial for novices. It is unfortunate that many young people are not aware of the fact that courses are not able to provide the in-depth theoretical and practical training that is required for professional growth and effective work in the design industry. Non-formal education is only capable of providing individual, fragmentary knowledge; it is incapable of providing a systematic understanding of the technological, economic and organisational aspects that are integral parts of any profession (The War for Education, 2025).

The inadequate level of advanced training of educators is problematic, as it frequently follows a conventional approach and fails to take into account contemporary industrial and scientific advancements.

The lack of practical experience among teaching staff in the latest technologies limits educators' ability to convey relevant knowledge to students, further widening the gap between employer requirements and the training level of graduates (Open Education, 2025).

A further issue is the low salaries of teaching staff, which frequently equate to the subsistence level.

This, in turn, has been demonstrated to reduce their motivation for professional development, which has a detrimental effect on the quality of education, especially in technically complex areas such as design and sewing.

Low salaries lead to low social stability among educators, which directly affects their professional development and qualifications. If teaching staff are forced to seek additional sources of income or focus on other activities to meet their basic needs, they will not have the time or resources to participate in inservice training courses, attend scientific conferences, develop new educational programmes or enhance their teaching methods.

The low salaries of educators present challenges that encompass not only economic factors, but also significant social and ethical dimensions. It affects not only financial well-being, but also human dignity. Fair remuneration for educators acknowledges the importance of their work and reflects the value placed on education within the national strategy. It is essential for fostering a strong, educated and progressive society.

The low salary level pushes young professionals away, with many choosing to work in other sectors of the economy that offer higher pay. This leads to a shortage of qualified personnel, exacerbating the situation in the industry (Bielousov, 2024).

The limited interest shown by young people in this area is attributable to preconceived notions about the industry as being unpromising or characterised by intense competition with international manufacturers, as well as the absence of clearly defined career pathways.

Even high-quality education does not always guarantee employment and success for emerging designers in the fashion industry. Training in this field can open up numerous opportunities for creative fulfilment and professional growth. However, today's market often requires young designers to set up their own brands, companies or firms in order to implement their ideas.

Although self-employment provides the freedom to choose the direction of work, it also increases the level of risk. Moreover, setting up one's own business requires considerable effort and resources, and securing financing can be one of the most challenging aspects at this stage.

The financial obstacle represents a significant impediment for talented designers with considerable ambitions who are unable to realise their potential due to limited resources. In the absence of adequate financial support and sufficient infrastructure for emerging businesses, many gifted designers find themselves compelled to abandon their aspirations. This situation necessitates a comprehensive approach.

The educational process is of pivotal importance in promoting the apparel industry among the younger generation. The organisation of creative competitions and fashion shows, in addition to active participation in exhibitions and international projects, serves to engage students in the development of the industry. However, in light of the ongoing war, the frequency of such events has diminished significantly.

Such events are undoubtedly of significance for the purposes of professional development. Concomitantly, engagement in such initiatives necessitates a substantial financial contribution. In many cases, these costs can be prohibitive, especially for young designers who are in the early stages of their careers and who are still in a period of uncertainty due to the war. It requires not only financial stability, but also a willingness to invest heavily in business development. Consequently, people sometimes have to put their creative ambitions on hold. This limits their opportunities for development.

The ongoing war in Ukraine since 2014, including the full-scale invasion in 2022, has had a significant impact on the country's higher education system. One consequence has been the optimisation of higher education institutions (HEIs), involving a reduction in the number of universities, programmes of study and teaching staff. The main factors behind these changes are demographic shifts, student migration, economic challenges and government education policy.

One of the most painful consequences of the war is the loss of human life, including children and young people who might have gone on to become students. The war has also caused Ukrainian families to emigrate in large numbers. Many of these children and young people opt for European universities, resulting in a decline in the number of applicants to Ukrainian higher education institutions. This reduction in demand for educational services directly affects the government and universities, forcing them to downsize. However, it is important to note that a significant proportion of international students continue or complete their studies at Ukrainian universities via distance learning.

The amalgamation of universities has been demonstrated to reduce expenditure; specifically, the costs associated with the maintenance of physical campuses. This approach is equally applicable to institutions that have been relocated as a consequence of hostilities.

Educational programmes are being optimised due to a combination of decreasing relevance and a falling student population. Furthermore, universities are compelled to reduce their teaching staff. Due to reduced state funding and falling student enrolment, many professors have lost their positions or transitioned to part-time roles. Some have sought opportunities abroad, while others have moved into different sectors. It is also important to note that many Ukrainian scientists and professors have been forced to work in

the private sector due to low salaries in higher education institutions.

The process of optimising universities and specialities has both positive and negative effects. The advantages include:

- Reducing the cost of maintaining less efficient educational establishments and redirecting resources to support more competitive universities;
- improving the quality of education by concentrating funding on fewer higher education institutions, which can improve teaching and research;
- updating educational programmes in line with labour market needs, which increases the competitiveness of graduates.

Such optimisation of higher education institutions can have a positive effect if funding is increased, such institutions are modernised, and professors' salaries are increased. This, in turn, will help attract young professionals and develop the industry.

However, there are also considerable disadvantages:

- Loss of scientific capacity due to the reduction of teaching staff.
- Closure of certain specialities, which may lead to a shortage of specialists in certain fields in the future.
- Limited access to higher education for students in regions where universities have been closed or merged. This is especially relevant in times of war.
- The closure of higher education establishments in cities reduces educational opportunities and actually destroys cultural centres in the regions that shape the intellectual and scientific environment, promote local initiatives and preserve cultural heritage.

Therefore, optimising higher education is a necessary response to the current challenges facing Ukraine. However, a balanced approach is required to minimise negative consequences and maintain the potential of Ukraine's education and research sectors.

If carried out correctly, optimisation can have positive effects. Investing in education, developing grant programmes and modernising educational institutions will help attract young professionals to the industry. However, these goals can only be achieved if funding is increased and educators' and researchers' salaries are raised. Currently, these salaries are at a subsistence level, which significantly restricts the recruitment of new staff and hinders the development of the education sector.

Against the backdrop of the Russian-Ukrainian war, training specialists in the apparel industry has proven to be a significant challenge. The lack of stability in the country, combined with inadequate financial and material resources, and the compulsory mobilisation of a large proportion of the workforce, poses serious obstacles to effectively training new personnel in this field.

The fashion industry in Ukraine is currently facing significant challenges. A decline in production

capacity, logistical issues, the conscription of men into the army and changes in consumer demand are causing problems for businesses. Over 3 million people have lost their jobs, and more than 7 million Ukrainians are now living in poverty. At the same time, many companies are forced to adapt their production processes to meet army requirements or manufacture other products. This also restricts opportunities for traditional apparel industries.

Despite the difficulties, leading Ukrainian educational institutions continue to train fashion specialists, though most higher education establishments have stopped enrolling students on this course. This decision is influenced by numerous factors, including current challenges and trends in education and the fashion industry. Primarily, it stems from changes in market demand and shifting priorities among higher education institutions. There is a growing demand for other areas of design, such as graphic and motion design and digital technologies. In response, universities are realigning their educational programmes to better match market needs and the preferences of prospective students.

Ukrainian universities are striving to use their resources efficiently by focusing on the programmes that are in the greatest demand from applicants and employers.

Furthermore, the war has given rise to cultural initiatives that are focused on the support and development of the Ukrainian fashion industry. A noteworthy initiative is the cultural diplomacy project by Fashion Globus Ukraine, titled "What is the Secret of Ukraine's Resilience?". The present project explores the impact of the war on culture and education, emphasising the significance of fashion as a component of national identity and resilience.

The return of Ukrainian Fashion Week to Kyiv in 2024 was a significant event. The event served to demonstrate the resilience of the Ukrainian fashion industry. Furthermore, it provided a platform for emerging designers and students, thereby facilitating their professional development and integration into the global fashion community.

In response to these challenges, educational institutions and apparel companies have initiated the establishment of mechanisms for public-private partnerships with the objective of enhancing the training of skilled workers. This initiative encompasses the updating of professional and educational standards, the introduction of integrated sewing professions, and the modernisation of vocational education content.

3. Recommendations for Enhancing the Training of Specialists for the Apparel Industry

Foreign companies recognise that students who have completed high-quality industrial placements will

eventually form the backbone of the national labour market, making a significant contribution to economic development. A business's success is directly linked to the level of training its staff receive: the better trained the employees, the less additional training is needed. Companies that engage in the educational process can establish their own quality standards.

Unfortunately, this system does not function effectively in Ukraine. Often, businesses do not engage in the training of specialists. Typically, enterprises and vocational education establishments only collaborate in terms of sponsorship.

The main difficulties arise at the initial stage of establishing communication between enterprises and vocational schools. Companies are often unaware of the relevant educational institutions in their region. Even when they are aware of them, they do not know how to establish effective co-operation, believing that they are only expected to provide financial support.

Vocational schools frequently perceive businesses as mere sponsors rather than as equal partners. However, the motivations of companies can be more profound, as the shortage of qualified personnel drives them to seek a role in shaping the educational process.

Enterprises can contribute to improving the training of professionals by:

- Participating in the creation of professional standards and modern training materials (video tutorials, simulations, drawings);
- conducting classes for students;
- organising internships and training, as well as joint dual programmes;
- implementing professional development initiatives for educators;
- participating in supervisory boards to determine the development strategy of the institution, etc.

The model functions most efficiently within industries in which students can provide substantial benefits during their internships, such as in sewing.

The EdUP project, which aims to enhance the skills of apprenticeship masters, warrants special attention. While it is impractical for businesses to engage with all students simultaneously, they can modernise the methods employed by educators, who in turn will disseminate this knowledge to their students. The EdUP project is an educational initiative that organises workshops for individuals in various professions.

The #100 Workshops initiative merits consideration, as the Ukrainian government has allocated 549 million UAH to enhance production workshops in 2024. This initiative constitutes a pivotal stride in fortifying vocational education as the cornerstone for the nation's revitalisation.

The establishment of a systematic partnership between business and vocational education has the potential to provide significant support for both the wartime economy and its recovery in the post-war period. In periods of crisis, the rapid training of skilled professionals is of paramount importance in ensuring production stability, minimising downtime and losses, and preserving essential competencies within the country.

During wartime, this approach enables educational establishments to train specialists who can promptly begin working at critical enterprises and set up mechanisms for job retention while attracting young people to the real economy.

The need for skilled workers will only grow after the war. The government will need to rebuild infrastructure quickly, modernise ruined production facilities and establish new enterprises. Close co-operation between educational establishments and businesses is essential if we are to train personnel capable of filling vacancies and driving restoration.

So, the main recommendations for enhancing the training of specialists in the apparel industry are as follows:

- 1. The establishment of specialised programmes to support vocational education.
- Development of national and regional training programmes for the apparel and fashion sectors.
- Provision of grants and low-interest loans for educational institutions and apparel enterprises.
- Developing a national strategy for the apparel industry.
 - 2. The modernisation of educational programmes.
- Integration of contemporary technologies into the educational process (such as automated cutting and sewing systems, 3D modelling, etc.).
- Introduction of courses focusing on modern fashion management and entrepreneurship to foster the development of local brands.
- 3. Strengthening co-operation between education and business.
- Introduction of dual education, allowing students to integrate their studies with practical work experience.
- Establishment of internship programmes and collaborations between educational institutions and businesses.
- 4. The development of distance education and retraining.
- Introduction of courses aimed at students and adults who wish to change careers or acquire new skills.
- Development of training platforms that provide accessible resources for sewists, designers, and technologists.
- 5. The involvement of international experience and support.
- Co-operation with international organisations and educational establishments to gain new experience and training methods.
- Participation in international grant programmes that support the development of the apparel industry, the fashion industry, and education.

The war has created numerous challenges for the training of specialists in the Ukrainian apparel industry. Nevertheless, the adaptation of educational programmes, the provision of support to enterprises, and the fostering of international co-operation have the potential to assist in the preservation and advancement of the industry, even in the midst of crisis situations.

4. Conclusions

In conclusion, the Russian-Ukrainian war has had a considerable impact on structures and processes, as well as a profound effect on strategic planning approaches across the economy, governance, social, and educational fields. Evident in both the fashion industry and the field of education, these changes are characterised by the emergence of novel educational models, an accentuated focus on human capital development, and a necessity to adapt to the prevailing market conditions. This period is characterised by pervasive uncertainty regarding a variety of scenarios and the actual state of affairs. It is imperative that Ukraine's post-war recovery encompasses not only the physical rebuilding of infrastructure but also a thorough re-evaluation of vocational education concepts. It is imperative that such an effort takes into consideration the emerging challenges that are currently being faced, and that it establishes a strategic vision for the advancement of creative industries.

The establishment of partnerships between educational institutions and businesses is of paramount importance for the preservation and development of the country's human resources. In times of war, such collaboration enables a swift response to changes in the labour market, facilitates the training of specialists aligned with the economy's real needs, and supports the ongoing operation of critical industries.

Entrepreneurs who engage in personnel training invest in their future talent pool and contribute to the social recovery of the country. Conversely, educational institutions adapt their curricula to align with production requirements, thereby ensuring the rapid and high-quality training of competitive specialists.

In order to achieve sustainable outcomes, it is essential to consolidate co-operation models, develop dual programmes, establish permanent communication platforms between businesses and educational institutions, and secure government support.

The advancement of vocational education in regional areas is of particular significance, as it assists in the retention of young people within communities and fosters economic growth.

Consequently, the integration of business into the education system is not merely a contemporary necessity but also a strategic move towards economic stability and the effective restoration of Ukraine. Investing in research and innovation is crucial for improving the efficiency of educational establishments and manufacturing enterprises.

Furthermore, collaboration between businesses and educational institutions is essential to improve specialist training and enhance graduate competitiveness.

The Russian-Ukrainian war has posed serious challenges to the Ukrainian fashion industry, particularly with regard to specialist training. However, the industry has demonstrated resilience and recovery by adapting educational programmes, engaging in active cultural diplomacy, and hosting key events, thereby training a new generation of professionals ready to meet modern challenges.

The absence of mechanisms for co-financing education between the state and the business sector is a significant impediment to the training of qualified personnel in the fashion industry. The implementation of tax incentives, the development of dual education programmes, the attraction of international support, and the establishment of a comprehensive state strategy have the potential to improve the situation.

The majority of Ukrainian apparel companies lack the financial resources to invest in education due to the economic instability caused by the war. Moreover, the absence of government incentives (tax breaks, grant programmes, subsidies) renders such funding unattractive for businesses.

References:

Derman, L. (2020). Digital design and presentation of a clothing collection as an automated grammar of the XXI century. *Culture and Modernity: An Almanac*, vol. 2, p. 118–122. DOI: https://doi.org/10.32461/2226-0285.2.2020.222363

Derman, L., Skovronskyi, B., & Rusakov, S. (2023). Fashion industry in Ukraine: development and prospects. *Baltic Journal of Economic Studies*, vol. 9 no. 2, p. 118–128. DOI: https://doi.org/10.30525/2256-0742/2023-9-2-118-128

Podolevskyi, A. A. (2024). Study of the Problem of Labor Shortage in the Job Market Using the Example of the Sewing Industry. *Electronic International Journal*, vol. 32, pp. 81–86. Available at: https://ei-journal.in.ua/index.php/journal/article/view/672/654

Kucher, O. (2023). International Experience in Implmentation of Dual Education. *Pedagogical Pscychology*, (2). Available at: https://pedpsy.duan.edu.ua/images/PDF/2023/2/9.pdf

Bielousov, Ya. I. (2024). Spatial Models of Light Industry Development in the Context of Regional Policy. *Electronic Scientific Journal*, p. 1–19. Available at: https://econp.com.ua/index.php/journal/article/download/143/115/208

Sewing School at the TK-Style factory: what is it and how does the training go? Available at: https://surl.li/pfkolp The School of Sewing Skills has started training sewers. Available at: https://tkstyle.pro/article/shkola-shveinoyimaisternosti-pochala-pidgotovkushvachok

The current state and prospects of development of apparel industry enterprises in Ukraine: the article analyses the current state of apparel production in Ukraine, identifies priority measures to stabilise the activities of apparel enterprises in crisis conditions and studies prospects for expanding their activities in the Ukrainian market. KNEU DSpace Repository. Available at: https://dspace.kneu.edu.ua/handle/123456789/8765

Ukrainian Fashion Council (2021). Available at: https://tkstyle.pro/article/shkola-shveinoyi-maisternosti-pochala-pidgotovku-shvachok

Ukrainian Fashion Council (2021). Available at: https://surl.li/djtffm

Ukrainian Fashion Week (2022). Available at: http://fashionweek.ua/

Ukrainian Association of Light Industry Enterprises (2025). Available at: https://ukrlegprom.org/ua/

Ukrainian Fashion Council (2021). Available at: http://fashioncouncil.org.ua/info

UKRLEGPROM CONFERENCE '2023 "Light industry. Recovery. Together to Victory". A report on the conference organised by Ukrlegprom Association, including a discussion of cooperation between educational institutions and light industry enterprises. Available at: https://surl.li/hxeipv

Are you having a staff shortage? Get ready to cooperate with vocational schools, advises Deputy Minister of Education and Science Dmytro Zavhorodniy. How does he see this partnership? Available at: https://surl.li/yimpcl Open Education: the latest technologies in the educational process and distance learning. National Institute for Strategic Studies. Available at: https://surl.li/kbqdyn

The war for education. The state of Ukraine's top 10 universities in the second year of the great war. Available at: https://surli.cc/wayxod

How to promote cooperation between universities and business? Analytical report on the ways of effective cooperation between educational establishments and business in various sectors. *Centre for Economic Strategy.* Available at: https://ces.org.ua/wp-content/uploads/2020/08/

Received on: 01th of July, 2025 Accepted on: 18th of August, 2025 Published on: 24th of September, 2025