The "Philosophy of Education" Evolution in the Context of Post-History and the Rise of a Brand-New Philosophical Paradigm

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Abstract: *The current sociocultural landscape is characterised by the rapid growth of social sciences and an accumulation of knowledge in social and humanities expertise. At the same time, there is an accelerated development of social education. The global educational crisis, coupled with the drawbacks of existing reform strategies, has highlighted the need for philosophical reflection on education. Achieving educational objectives at the international (those initiated by UNESCO) and national levels requires new conceptual, methodological and axiological approaches. In the 21st century, the philosophy of education must allow for individual choice in addressing traditional metaphysical questions while being rooted in a collective understanding of present-day realities. However, the educational system is overly focused on past scientific knowledge and often neglects culture, human nature and existential needs. As a result, today's education, lacking deep roots in the cultural-historical process, inadvertently disconnects people from their cultural heritage, leading to potentially harmful outcomes. Meanwhile, one's perception of the world and humanity is shaped by human creativity and the cultural-historical foundations of human communities. Even science draws its norms from these foundations and serves as a component and expression of culture. This article analyses current approaches to defining the role of the philosophy of education, as well as identifying key trends in its development within Ukrainian and international scientific discourse. It provides a historical overview of the periods when the philosophy of education first emerged as an aspect of post-history. Additionally, the article explores the evolution of a new philosophical paradigm within the education sector. Finally, it uncovers the potential consequences for both educational thought and practice.*

Keywords: *philosophy of education, educational discourse, the phenomenon of education, philosophy, pedagogy.*

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Introduction

Today, one can observe the expansion of synergetics into diverse fields of human knowledge. Its principles and concepts are increasingly applied to understanding cognitive processes and the evolution of science as a cultural domain. This raises an important question regarding the applicability of synergetics to education. The answer is affirmative, provided that education is viewed as an open, evolving system, not limited by rigid, prescriptive forms and structures. In this view, the learner should be considered a complex system with essential synergetic properties. These properties include openness and constant interaction with the natural and social world through exchanges of matter, energy, and information. The world that education seeks to explore is defined by characteristics such as non-equilibrium, instability, non-linearity, irreversibility, and openness. These qualities highlight the need to transform the current educational system. The transformation should foster organisational and intellectual openness, nurture creativity, and encourage freedom and spontaneity. It should also allow learners to express their individuality within the educational experience.

In Ukrainian academic discourse, the philosophy of education is a discipline that examines key patterns and relationships within education. It also offers a unique approach to understanding these phenomena in the context of post-history. On one level, it serves as a framework for scientific ideas about the education sector. On another, it represents the worldview shaped in individuals through education, development, learning, and upbringing. This field embraces diverse perspectives on human nature, development, and the meaning of life (Andrushchenko & Peredborska, 2004; Radionova, 2002).

In international academic discourse, educational issues in philosophy are often linked to broader questions about the essence of humanity and society, as well as the objectives of their improvement. The epistemological dimension of these issues expands the discussion on human cognitive abilities, their limits, forms, and development in ontogenesis and phylogenesis. It also explores the relationship between sensory and rational knowledge in the educational process. The axiological dimension addresses questions about what and how to teach. It also considers the criteria for selecting knowledge to transmit, its accessibility to different social groups, and the hierarchy of values cultivated during education, including the key forms of educational activity (Bell, 1976; Waugh, 1992).

As noted by Nerubasska et al. (2020), a prominent trend in today's pedagogy is its return to foundational ideological principles. The reorientation

of pedagogy towards personal development, alongside the revival of humanistic traditions, is primarily focused on establishing a humanistic philosophy of education. This philosophy provides the methodological framework for pedagogy. Educators and philosophers have shown that Ukrainian schools, by relying on pedagogical methods and philosophical concepts, have taken a leading role in advancing a new field of study: the philosophy of education. This has been especially important during the ongoing changes in the educational system.

This article aims to analyse current approaches to defining the status of the philosophy of education. It also seeks to identify key trends in its development within Ukrainian and international academic discourse. Additionally, the article explores the historical context surrounding the emergence of the field as an aspect of post-history. It examines its evolution and investigates the formation of a new philosophical paradigm.

The historical context of the philosophy of education as part of post-history

The philosophy of education has established itself as a unique branch of scientific understanding only recently. Still, its roots trace back to the historical panorama of various eras. Throughout the history of philosophy, educational issues have been explored from diverse perspectives. These include theocentrism, anthropocentrism, naturism, and sociocentrism. Justification for these perspectives has largely been based on ideals and values related to moral duty.

In many philosophical works, education is synonymous with upbringing and the formation of human subjectivity. The educational process shapes principles and patterns for interacting with nature, society, and knowledge. It establishes norms for relating to others and oneself. At the same time, education allows individuals to develop their social and subjective practices based on acquired stereotypes. This alters the forms of their objectification, fostering historical and social progress.

The sociocultural context, national traditions, and worldview of a given era directly influence the educational concepts embedded in the philosophical traditions of that time. In primitive cultures, education was primarily normative in nature. It was often mythologised and syncretic. The accumulation of knowledge became possible with the advent of writing. In early societies, education, though seemingly based on anarchic and powerless principles, was rooted in an alternative understanding of social discipline compared to Western European educational traditions. It focused on fostering a sense of discipline and subordination, which ensured the stability

and cohesion of society, particularly concerning vertical hierarchical structures. In Ancient Greece, education was democratic in nature. Intellectual development was promoted through engagement with philosophy, mathematics, and the arts.

For the first time, the "word" began to be understood as the "key to peace and society". In ancient philosophy, the understanding of its essence is linked to the names of Pythagoras (2009), Plato (1943) and Aristotle (2023). The philosophy of education during the Middle Ages was marked by the promotion of moderation, humility and obedience. During the Renaissance, education saw a revival of ancient values. The 17th century brought a renewed focus on the absolute value of rationality, a belief in the unlimited potential of science and the ideal of the "rational person".

Education in the modern era is defined by a departure from the universalism and humanistic content that characterised the previous age. Each individual, according to their status and role, receives an education that is specifically suited to them. Enlightenment philosophers believed that the development and full blossoming of the human mind would overcome all forms of unfreedom. This process was seen as dependent on the prolonged moral improvement of both individuals and humanity as a whole.

Rousseau (2000) introduced a pedagogical doctrine that nearly entirely refuted the prevailing dogmas of the time. He also argued that education should focus on developing the "human being in general". It follows that the historical goal of education is to teach people the art of living. German education, in this context, began to take on a historical, global significance, rather than focusing solely on personal development. According to Kant (2023), education is the cultivation of humanity within the individual. Simultaneously, key developments in the philosophy of education in Ukraine were shaped by influential educators and social leaders.

The "philosophy of education" evolution as an aspect of post-history

In this article, the term "post-history" refers to a socio-cultural phase in human development. This phase emerges after the end of the grand ideological projects of the modern and contemporary eras (Freire, 2018) uring it, historical progress is no longer viewed as a linear or inherently progressive process. Post-history is understood in connection with the shift toward a post-industrial, informational, and networked society. In such a society, traditional educational paradigms lose their relevance. As a result, the philosophy of education takes on a new role – serving as a reflective response to emerging forms of existence, knowledge, and identity. This era is marked by a

reassessment of metanarratives. Education, in turn, becomes a tool for self-construction within the conditions of radical pluralism.

The critical pedagogy of postmodernism has been a crucial factor in advancing the philosophy of education. It aimed to enrich, diversify and expand the educational space through critique, rethinking and presenting broader perspectives on phenomena and processes.

In the 20th century, a clear struggle emerged between two educational trends: authoritarian and democratic. The main values of authoritarian education are conformity and dogmatism. In contrast, democratic education emphasises values such as justice, freedom, mutual respect, creativity, tolerance, and a commitment to lifelong learning. It also focuses on the humanisation of societal ideals.

The 20th century witnessed the emergence of specific trends that shaped the national philosophy of education. The philosophy of education is an independent scientific discipline. It is based not solely on general philosophical doctrines related to education, but also on the objective laws governing the development of the educational sphere in all its aspects. However, Romanenko (2001) analyses the philosophy of education from two perspectives: the real and the ideal, focusing on the goals, roles and content. The classical model of education, shaped by the contributions of numerous philosophers and educators and eventually forming a theoretical framework, has largely reached its limits.

The goals of education must be clearly defined and individualised. First, it is crucial to avoid the fragmentation of educational objectives. Second, it is important to recognise that the demands for education are formulated by representatives of specific social and professional groups or individuals. As a result, all "stakeholders" should be directly involved in the process of defining the educational goals. Third, it is necessary to specify the "symptom complex of personality development," establish development criteria and align them with the abilities and potential of each student. Fourth, the unique capabilities of each educational institution and teacher must be considered in achieving the set educational goals.

In the 21st century, some of the most influential ideas that broaden the philosophical understanding of education include a) the concept of personal development; b) recognizing the impact of culture on knowledge transmission; c) understanding the role of social groups in knowledge generation; and d) expanding views on the influence of social-organizational and economic connections.

The current understanding of the educational system extends beyond the limits of "vocational education" only. Education serves as a tool for

societal consensus. It is a means of harmonising public interests, consolidating the population, and ensuring the sustainable development of society. Consequently, the philosophy of education is oriented toward scientific knowledge and insight. The growing awareness of philosophical aspects in education arises from the increasingly acknowledged role of education. It is also objectively recognised for its role in addressing global challenges (Jameson, 1991).

Considering these circumstances, a new approach to educational policy, philosophy, theory and practice is necessary. The educational system should focus on expanding the number of humanities disciplines and revising the internal priorities within education.

Most scholars agree that a new humanistic concept for the educational institution should rely on the principles outlined below: a) an individual is a self-developing system, and education should foster this development; b) an individual is an open system, requiring a thorough examination of their connections with the social world and the influence of global and national cultures; and c) an individual is a biopsychosocial being, and the impact of genetic factors, the natural development of the psyche and the surrounding environment, especially the social context, should be taken into account.

Therefore, education should focus on the biopsychosocial qualities of individuals. It should balance autonomy and freedom in organising the learning process, along with a pluralistic approach to educational models.

While humanities education is actively promoted, alternative approaches, such as utilitarian or STEM-oriented models, are often dismissed without sufficient analysis or open discussion. This leads to a one-dimensional perspective that does not capture the actual complexity of the educational process. Empirical studies, for instance, indicate that incorporating the humanities into STEM education can be highly beneficial. The STEAM approach has been shown to enhance the development of critical thinking, ethical awareness, and emotional intelligence (Kefalis et al., 2025).

In today's world, there is a pressing need for a new paradigm in educational policy, philosophy, and practice. This updated system should not only broaden the role of the humanities but also reconsider the fundamental goals of education. The focus should shift from merely acquiring knowledge to fostering the development of the individual as a holistic being.

According to Nerubasska & Maksymchuk (2020), a renewed humanistic approach must rely on a solid foundation of core principles. These principles are summarised in Table 1.

Table 1. Key principles of the renewed humanistic approach to education

Principle	Description
The individual as a self-developing system	Education should foster self-realisation, rather than merely imposing knowledge.
The individual as an open system	A comprehensive understanding of how individuals interact with their cultural, social, and informational environments is essential.
The individual as a biopsychosocial being	Education must take into account the genetic, psychological, and social factors that influence personal development.

Source: the authors' own conception

According to Nerubasska & Maksymchuk (2020), it is essential to optimise the balance between the individual and social dimensions of the educational process. Educators should be encouraged to design personalised courses tailored to the student's personality, individual learning plans, and the current realities and future directions of society.

Education is intended to serve the interests of the individual and fulfils several key objectives. First, it aims to harmonise the relationship between humans and nature. Second, it promotes intellectual development by applying the latest scientific methods to enhance individual thinking. Third, it supports socialisation by immersing individuals in various cultural environments, including technogenic and computerised contexts. Finally, it responds to the growing need for advanced scientific literacy, emphasising integrative trends in scientific development and providing a broad educational foundation that enables quick adaptation to related professional fields (Harvey, 1991).

When examining the current educational model, it is important to recognise the new approaches to studying societal development and the formation of moral-social relations. These approaches are accompanied by emerging forms of interdisciplinary collaboration across fields such as pedagogy, psychology, philosophy, and ethics. They are also marked by continuity within traditional paradigms of scientific knowledge. Traditions and innovations in education are not in opposition, but rather interact in a dynamic way (Weizsaecker & Wijkman, 2018).

Therefore, the philosophy of education serves two key purposes. First, it addresses traditionally applied issues in pedagogy. Second, it provides a framework for understanding and conceptualising the educational system as a whole. This includes examining its philosophical, anthropological and social dimensions.

Rethinking the educational paradigm: pathways from theory to practice

The idea of restoring personal integrity through education, as part of a new philosophical paradigm, exceeds theoretical discourse and requires practical application. This approach aims to address the crisis of technocratism, where education is increasingly reduced to a set of competencies, devoid of humanistic or value-based perspectives.

However, implementing a humanistic concept faces several challenges. These include institutional inertia, the dominance of utilitarian approaches, standardised assessments, and the fragmentation of the educational space (Nussbaum, 2012).

In response to these challenges, today's philosophical and pedagogical concepts offer specific strategies for transforming educational practice. These include critical pedagogy (Freire, 2018), cultural pedagogy (Nussbaum, 2012), the theory of multiple intelligences (Davis et al., 2011), and the interdisciplinary humanistic approach (STEAM) (Montés et al., 2024). Table 2 provides practical recommendations for transforming education at three levels.

Table 2. Practical strategies for implementing the humanistic education paradigm

Level of implementation	Strategy	Expected outcome
Institutional	- Granting autonomy to educational institutions	Greater variety in educational programmes, tailored to the context
	- Introducing proprietary courses	Increased innovation and creativity in the educational process
	- Assessment through portfolios and projects	Focus on growth and development, rather than memorisation
Pedagogical	- Dialogic learning and critical thinking	Encouragement of student autonomy and reflective thinking
	- Personalising educational pathways	Better alignment with student abilities and interests
	- Integrating humanities content into technical fields (STEAM)	Cultivation of ethical and cultural perspectives
Political/societal	- Public involvement in defining educational goals	Enhanced legitimacy and trust in education
	- Legislative support for alternative education models	Wider range of learning models and formats
	- Public debates on educational values	Creation of social consensus regarding the purpose

Source: the authors' own conception

Thus, the reform of the educational system requires a comprehensive transformation. This transformation should move away from simply transmitting knowledge and toward fostering the development of an open, self-developing, biopsychosocial individual. Implementing these approaches demands not only changes in educational policy but also a shift in how the role of education in society is perceived.

The emergence of a new philosophical paradigm

Education is a continuous process of self-creation. In a synergetic sense, it is an objectless process where the subject and object are the same. Rather than being externally constructed, the individual is formed from within, with the personality developing through the processing of available information. In this process, the personality can be compared to a spiritual monad that reflects the entire world. It is always open through all its layers of existence and functions both as a focused point and as a complete whole (Carnevale et al., 2011).

The key feature of self-organisation in personality is spontaneity, namely, the free expression of its inherent potential. However, this process is structured, and its essence lies in creating the conditions that enable the full expression of this spontaneity and freedom.

In the context of educational reform, it is essential to move away from rigidly structured educational content and methods that rely solely on question-and-answer formats. These approaches often overlook the individuality and creativity in how people engage with the world. Human activity functions as a system at the synergetic level, where its unity is revealed through various dimensions. This system is driven by self-organising processes typical of open systems. Individuality, as a unique and creative subjectivity, is a key example of such a system. In today's student and postgraduate environment, especially under societal instability, there is a growing interest in synergetics. This field enables the exploration of self-organising phenomena, the dynamics of open systems, and the role of randomness and chaos. It also helps to understand catastrophic shifts in systems and the mechanisms behind alternative system developments. By applying synergetics, educators can integrate social sciences, the humanities, and natural sciences into a cohesive worldview. This promotes non-linear thinking in students, allowing them to better describe and explain the unstable, unpredictable, and irreversible processes in both nature and society (Gadamer, 1982).

Such knowledge is crucial for professionals who must be capable and ready to make informed management decisions in probabilistic social

situations involving numerous variables. In an open democratic society, instability is a defining feature. Governing bodies cannot fully control all social processes. As a result, the course of events in such societies is influenced by what is known as a "strange attractor," rather than a simple or predictable one. This means that each moment is filled with uncertainties and unpredictability. Consequently, it challenges the assumptions of the outdated educational system, which is based on the belief in the possibility of absolute control over society (Toulmin & Groome, 2007).

During the process of cognition, nature's responses to questions are determined not only by the intrinsic properties of the world. They are also shaped by how the questions are formulated. This formulation is influenced by the historical development of cognitive methods and tools. In non-classical science, the observer becomes part of the observation system. As a result, a new understanding of the world emerges – one that varies depending on the observer's perspective (Onyshchenko, 2014).

It is now clear that the world does not have a single centre. Instead, it is multicentric in nature. The bootstrap method, which deserves a place in education, reflects an anti-fundamentalist mindset. This mindset rejects the Democritus tradition (2010) of simplifying complex systems by reducing them to basic elements. As a result, the distinctions between components of nature and their interactions begin to disappear. Things and events, matter and motion, merge into one another. From this perspective, the world is seen as a unified, indivisible whole. The elements of nature are no longer viewed as material entities but as phenomena rooted in events (Ohneviuk, 2003).

In the educational process, one of the core principles should be the unity of the individual and the world. This principle connects a variety of physical, epistemological, ideological, and axiological issues. These are all addressed within the broader framework of global evolutionism. From this standpoint, the universe is no longer perceived as a massive machine composed of countless separate objects. Instead, the world is viewed as a harmonious and indivisible whole. It is seen as a network of dynamic relationships that includes the observer and their consciousness. The individual is considered a tool for self-realisation, a high-level entity that emerged from the evolution of lower-level systems. This view encompasses both mind and body as components, reconciling the inherent contradictions between them.

The theory of self-organisation (synergetics) offers a new understanding of the unity between humans and nature, as well as between nature and society. As part of a self-developing system, the individual cannot forcibly reshape it without triggering catastrophic consequences. Therefore, 21st-century education must bridge the gap of alienation between individuals

and the world, and the world and individuals. It should restore personal integrity and free people from the fragmentation of human experience. Education should enable individuals to become a microcosm, capable of fully reflecting and processing the structure of the world (macrocosm) within themselves. The new educational system must save humanity from the extremes of today's technocratic pedagogy and the scientistic notions of progress.

The historical trajectory of the current era is marked by the growing perception that humanity, through education and technology, has taken responsibility for organising the world as a whole. Humanity believes it has found the right way to resolve global issues. However, as the forces of production, technology, and technique continue to grow, Earth and Nature become increasingly alienated from humanity. The unity of existence fractures into two opposing elements: the individual and the world that stands in contrast to it. The "one-object" structure most clearly reflects the truth of the technological rationality that dominates education today, based on the principle of control. Technological rationality represents a one-dimensional view of nature, seeing it only as a tool for fulfilling one's needs. The primary axis of the human-nature relationship has become the "goal – means – result" line.

The tragedy of humanity lies in the fact that the established forms of education, practices, and production technologies are generating this destructive "one-object" structure. This leads to the ontological relation of "domination-subordination." Human life has been transformed into a technological system focused on the technology of achieving success, acquiring wealth, social interaction, as well as gaining and maintaining power. Human connections are becoming more superficial as people are increasingly distanced from nature, from emotional experiences, and from one another. What is truly valuable and meaningful is being stripped away from human relationships. Ahead lie new disasters and global catastrophes, along with further trials for humanity. The current era seems characterised by a dark passion, driven by a desire for retribution due to the historical "blindness" and misunderstanding of nature. This passion is also fueled by the rough adventurism and violent tendencies that have been embedded in educational systems for centuries. It remains uncertain whether humanity can overcome this metaphysical mindset and, in doing so, transcend its limitations. The question of whether this is possible, along with the deeper nature of the world and human existence, continues to remain unresolved (Ohneviuk, 2011).

A key driver of educational reform is informatisation, seen as an essential condition and a pivotal phase in the country's broader move toward

informatisation. The transition from the industrial to the information society is built on advanced information technologies.

The informatization of education should enable the effective use of the following advantages of new technologies: 1) the creation of an open educational system that allows each individual to follow their self-directed learning path; 2) a shift in the organization of the cognitive process toward synergistic thinking; 3) the development of an efficient system for managing the informational and methodological support of education; 4) the use of specific properties of computer technology, including the individualization of the learning process while preserving its coherence, based on programmable and dynamically adaptable automated learning programmes; and 5) the opportunity to use and organize entirely new cognitive tools, including "virtual reality" models.

Informatisation will guarantee that education retains its fundamental nature, placing emphasis on revealing the essential foundations and connections between various processes in the world. It will promote integrity by introducing unified cycles of fundamental disciplines within education. These cycles will be interconnected by a common goal, aimed at fostering interdisciplinary connections. Additionally, it will prioritise the needs and interests of the individual.

Conclusion

The article's relevance lies in its exploration of current approaches to defining the philosophy of education. It demonstrates that the philosophy of education is grounded primarily in a critical analysis of the foundational and practical elements of the educational system.

The philosophy of education holds a distinct role, providing guidance and having a significant impact on the field. This context requires an examination of the overarching theoretical issues related to education. These factors have laid the groundwork for a new field of study, namely, the philosophy of education, which is primarily rooted in a critical examination of the fundamental principles of education.

Furthermore, the article highlights the main trends in the evolution of the "philosophy of education" within Ukrainian and international academic discourse. It offers a historical overview of the periods in which the philosophy of education emerged as an aspect of post-history. It also demonstrates how educational issues in philosophical history were often approached from various perspectives, such as theocentrism, anthropocentrism, biocentrism, and sociocentrism. These issues were largely justified by ideals and values based on moral obligations.

Numerous philosophical works view education as synonymous with personal development. This is because the educational process fosters the acquisition of principles, modes of interaction with nature, society, and knowledge. It also helps establish norms for self and interpersonal relationships.

Additionally, the article examines the development of the "philosophy of education" within a post-historical context. It addresses the rise of a new philosophical paradigm. The article also shares a historical perspective on the periods that gave birth to the philosophy of education as a dimension of post-history. Furthermore, it explores the evolution of this field within that framework.

References

Andrushchenko, V., & Peredborska, I. (Eds.). (2004). *Filosofiia osvity* [The philosophy of education]. National Pedagogical Dragomanov University Press.

Aristotle. (2023). *Aristotle: The complete works*. Happy Hour Books.

Bell, D. (1976). *The coming of post-industrial society: A venture in social forecasting*. Basic Books.

Carnevale, A. P., Smith, N., & Melton, M. (2011). *STEM: Executive summary*. Georgetown University Center of Education and the Workforce. https://files.eric.ed.gov/fulltext/ED525297.pdf

Davis, K., Christodoulou, J., Seider, S., & Gardner, H. (2011). The theory of multiple intelligences. In R. J. Sternberg & S. B. Kaufman (Eds.), *The Cambridge handbook of intelligence* (pp. 485–503). Cambridge University Press. https://doi.org/10.1017/CBO9780511977244.025

Democritus. (2010). *The history of the old Fring'd petticoat; A fragment: Translated from the original Ms. Greek of Democritus. with an epistle and dedication to Lord N*. Gale Ecco, Print Editions.

Freire, P. (2018). Pedagogy of the oppressed. In R. Falk (Ed.), *Toward a just world order* (pp. 1–8). Bloomsbury Academic. https://doi.org/10.4324/9780429269400-8

Gadamer, H.-G. (1982). *Truth and method*. Crossroad.

Harvey, D. (1991). *The condition of postmodernity: An enquiry into the origins of cultural change*. Wiley-Blackwell.

Jameson, F. (1991). *Postmodernism, or the cultural logics of later capitalism*. Duke University Press. https://ia801309.us.archive.org/32/items/FredricJameson.Postmodernism OrTheCulturalLogicOfLateCapitalism1990/Fredric%20Jameson.-Postmodernism%2C%20or%2C%20The%20cultural%20logic%20of%20late%20capitalism%20%281990%29.pdf

Kant, I. (2023). *Collected works of Immanuel Kant: Complete critiques, philosophical works and essays.* DigiCat.

Kefalis, C., Skordoulis, C., & Drigas, A. (2025). Digital simulations in STEM education: Insights from recent empirical studies, a systematic review. *Encyclopedia, 5*(1), Article 10. https://doi.org/10.3390/encyclopedia5010010

Montés, N., Barquero, S., Martínez-Carbonell, A., Aloy, P., Ferrer, T., Romero, P. D., Millan, M., & Salazar, A. d. S. (2024). Redefining STEAM to STEAM ∀H (STEAM for all humanity) in Higher Education. *Education Sciences, 14*(8), Article 888. https://doi.org/10.3390/educsci14080888

Nerubasska, A., & Maksymchuk, B. (2020). The demarkation of creativity, talent and genius in humans: A systemic aspect. *Postmodern Openings, 11*(2), 240−255. https://doi.org/10.18662/po/11.2/172

Nerubasska, A., Palshkov, K., & Maksymchuk, B. (2020). A systemic philosophical analysis of the contemporary society and the human: New potential. *Postmodern Openings, 11*(4), 275−292. https://doi.org/10.18662/po/11.4/235

Nussbaum, M. (2012). Not for profit: Why democracy needs the humanities. Princeton University Press.

Ohneviuk, V. O. (2003). *Osvita v systemi tsinnostei staloho liudskoho rozvytku* [Education in the axiological system of sustainable human development]. Znannia Ukrainy. https://elibrary.kubg.edu.ua/id/eprint/6850/

Ohneviuk, V. O. (2011). Osvitolohiia yak vidobrazhennia mizhdystsyplinarnoho pidkhodu u naukovykh doslidzhenniakh fenomenu suchasnoi osvity [Education studies as an interdisciplinary approach to studying the phenomenon of today's education]. In V. H. Kremen, O. V. Sukhomlynska, I. D. Bekh, V. O. Ohneviuk, V. M. Tkachenko, P. Yu. Saukh, D. I. Dzvinchuk, S. O. Sysoieva, & I. V. Sokolova (Eds.), *Rozvytok suchasnoi osvity: osvitolohichni naholosy: naukove vydannia za materialamy pershoi Vseukr. nauk.-prakt. konferentsii "Osvitolohiia – naukovyi napriam intehrovanoho piznannia osvity"* [Advances in today's education: Prospects for education studies. Proceedings of the 1st All-Ukrainian Scientific and Practical Conference "Education Studies as an Integrated Approach to Understanding Education"] (pp. 53–62). Borys Grinchenko Kyiv University. https://elibrary.kubg.edu.ua/id/eprint/44473/

Onyshchenko, V. D. (2014). *Fundamentalni pedahohichni teorii* [Fundamental pedagogical theories]. Norma. https://lib.iitta.gov.ua/id/eprint/4941/1/onishenkowww.pdf

Plato. (1943). *Plato's The Republic* (B. Jowett, Trans.). Books, Inc.

Pythagoras. (2009). *The order and the doctrine of Pythagoras.* CreateSpace Imprint.

Radionova, I. O. (2002). *Suchasna amerykanska filosofiia osvity ta vykhovannia: evoliutsiini tendentsii ta interpretatsiini mozhlyvosti* [Modern American philosophy of education: Evolutionary trends and interpretative opportunities] [Unpublished doctoral dissertation]. H. Skovoroda Institute of Philosophy. https://irbis-nbuv.gov.ua/cgi-bin/irbis_nbuv/cgiirbis_64.exe?Z21ID=&I21DBN=ARD&P21DBN=ARD&S21STN=1&S21REF=10&S21FMT=ref_full_aref&C21COM=S&S21CNR=20&S21P01=0&S21P02=0&S21P03=AT=&S21COLORTERMS=0&S21STR=%D0%A0%D0%B0%D0%B4%D1%96%D0%BE%D0%BD%D0%BE%D0%B2%D0%B0%20%D0%A1%D1%83%D1%87%D0%B0%D1%81%D0%BD%D0%B0%20%D0%B0%D0%BC%D0%B5%D1%80%D0%B8%D0%BA%D0%B0%D0%BD%D1%81%D1%8C%D0%BA%D0%B0%20%D1%84%D1%96%D0%BB%D0%BE%D1%81%D0%BE%D1%84%D1%96%D1%8F%20%D0%BE%D1%81%D0%B2%D1%96%D1%82%D0%B8$

Romanenko, M. I. (2001). *Humanizatsiia osvity: kontseptualni problemy ta praktychnyi dosvid* [The humanisation of education: Conceptual challenges and practical experience]. Promin. http://8ref.com/10/referat_106252.html

Rousseau, J.-J. (2000). *Confessions.* Oxford University Press.

Toulmin, C. N., & Groome, M. (2007). *Building a science, technology, engineering and math agenda.* National Governors Association. https://files.eric.ed.gov/fulltext/ED496324.pdf

Waugh, P. (1992). *Postmodernism: A reader.* Edward Arnold.

Weizsaecker, E., von, & Wijkman, A. (2018). *Come on! Capitalism, short-termism, population and the destruction of the planet.* Springer. https://link.springer.com/book/10.1007/978-1-4939-7419-1