

MONIKA CHRISTOPH¹

Education “Ever Anew” – A Reflection on the Changing Educational and Professional Reality in Theoretical and Practical Terms

ABSTRACT

The article aims to make a critical reflection, theoretical and practical, on the school and its functioning in the context of shaping the desired competences among graduates that distinguish them on the labour market. It is a strong impression that young people in the Polish classroom system still play the role of passive recipients of educational services rather than independent creators. Thus, there is a clear need to create high-quality bridges between the areas of pedagogical support for students in their educational and professional choices and the labour market and employers’ space in Poland. Education “ever anew” is the one that continually changes, adjusts its forms and contents to the changing socio-economic reality, creates a new quality focused on an individual and demanding recipient. The introduction takes the form of a brief reflection on the current dynamics of educational and professional life and the competences that will be needed in the future. The next section presents selected contexts and the diversity of the conditions of educational spaces in Poland. The summary contains inspiration for selected aspects of the future of education, such as the concept of learning in cyber parks and the use of “creative confidence” in learning.

Keywords:

labour market, career, future competences, contemporary school, education of the future, modern graduate, creative confidence

1 Faculty of Educational Studies, University of Adam Mickiewicz in Poznań, Poland.
E-MAIL: monikaba@amu.edu.pl ORCID: 0000-0003-4176-6099

INTRODUCTION

The article presents theoretical research. The methodology is based on document analysis, i.e., it refers to the existing written materials: protocols, reports, studies of the literature on the subject (indicated in the text) and digital (statistical) materials. The reflection presented in this article is mainly based on the knowledge and experience of the author of the text, who, in addition to working in a scientific and didactic position for over 15 years, for more than 2 years has worked as a pedagogue – vocational counsellor in an elementary school and has participated in many educational and professional youth projects. Therefore, in the author's opinion, it is justified to use the analysis method of reports and studies of the literature on the subject as a theoretical basis, giving a chance to achieve the assumed goal. The theoretical basis for the formulated problems and conclusions is the theory of lifelong learning, which is a key source of human biographical competences (Solarczyk-Ambrozik, 2016) to plan and organise one's own life and to acquire practical skills to deal with the challenges of education "ever anew". As Z. Wolk (2020, p. 85) states, "building a learning society requires creating conditions in the spirit of permanent self-development, with learners' own conviction of the need and relevance of continuous education" in a digital, complex reality.

The main goal is to present the specificity of the functioning of the Polish school in the context of shaping the desired competences among graduates that distinguish them on the labour market. Therefore, the author refers to the key problem of the role of education in preparing young people to work in contemporary, dynamically changing conditions. The theoretical and practical analysis presented in this article has been included in a structure that allows one to obtain an answer to the given problem and achieve the assumed main goal. Attempts were made to capture the most recent changes in the labour market and to adapt education to the complexity of its requirements. Particular modifications in this area are brought by computerisation, which has received much attention in this text. Electronics and information technology radically change the world of work and, in many cases, lead to modifying the structure of occupations, sometimes wholly changing their nature and the methods of work performed within them. Therefore, the following parts of the article indicate the related tasks facing contemporary education. These tasks play the role of separate problems and organise the structure of the study. The paper's summary shows conclusions and emphasises the importance of creativity and creative courage in education. Creativity and shaping creative courage among young people are nowadays an answer and a solution to key problems, both theoretical and practical, in education.

The reality today is becoming “continually reinvented”. The global, digital teenager lives in a world where the only reliable category is a change that characterises his/her educational, social, personal life and determines future educational and professional choices (Hatalaska & Skrzypek, 2019). On the one hand, this is everyday life, well-known and not particularly impressive, but on the other hand, there is a specific need for a sense of stability and security to distinguish oneself from the multitude of potential options. Building a strong identity for teenagers, based on their real resources and unique value system, in the world of heterogeneous meanings and discourses, seems to be one of the key tasks of a modern school. In 2009, Bogusław Śliwerski wrote that the “most important role of school in the 21st century will be to develop independence, activity, innovation and various techniques of communication. (...) Students will become authentic subjects of learning processes” (p. 320). Thus, there is a clear need to build bridges of high quality and adequacy between various areas of pedagogical support for students in their educational and vocational choices and the labour market and employers’ space in Poland. At this point, the question arises whether the theses and postulates are reflected in practice and actually created educational and professional reality? It is a strong impression that young people in the Polish classroom system still play the role of passive recipients of educational services rather than active, independent and innovative creators of individual development spaces. This article² addresses this issue by undertaking theoretical reflection and presenting the author’s professional experience³. Reviewing the scientific and professional literature and research reports, it can be concluded that the issues addressed in this study, relating to the dynamically changing in recent

2 The text uses excerpts from an article published in the journal *Forum Pedagogiczne*, Vol. 11, 2021, No. 1, entitled “The changing school towards labor market requirements, and not only”, Monika Christoph.

3 The reflection presented in this chapter is based on the literature sources, as well as on the knowledge and experience of the author of the text, who, in addition to working on a scientific and didactic position at the Faculty of Educational Studies of Adam Mickiewicz University in Poznan, for more than 2 years has worked as a pedagogue – school vocational counselor in an elementary school and participated in many educational and professional projects, such as “PUPIL WITH A PASSION - comprehensive support for elementary and junior high school students in choosing optimum educational and professional paths”, co-financed from ESF 2018–2019; “New quality of general education in Chodzieski district” as a vocational career counselor for secondary school students 2018–2019; “Program of school career counseling in Tarnowo Podgórne municipality” conducted by Talent Development Foundation in Poznań in the role of a vocational counselor for elementary school students 2018–2019. The author also participated as a trainer in projects improving teachers’ competences: the Craft, Dual and Vocational Education Support Centre in Kalisz (2017–2018) and “Exercise School in Krotoszyn – Wielkopolska Region” coordinated by the Faculty of Educational Studies, Adam Mickiewicz University in Poznań (2020–2021).

years educational and professional reality in Poland and selected future trends in education, is very timely and worth presenting. It should be emphasised that this issue, already raised frequently before, still presents the postulated image of reality in its message. In contrast, in practice, the classic relationship master – the authority of knowledge, and the student – one-sided recipient, indeed is changing at an extremely slow pace. As Zdzisław Wołk emphasises, it is on the effectiveness of activities carried out in formal education, their modernity and topicality of acquired competences, that the maturity of society and people’s readiness to face the challenges brought by civilisation requirements depend. Z. Wołk (2020, p. 71) says:

regardless of the criticism of formal education, especially school, it is impossible to replace it or exclude it from educational processes. It is necessary to constantly search for solutions adequate to the current social and economic needs, and above all, individual professional and life aspirations, which would facilitate the realisation of the tasks facing the formal education system.

The changeability and dynamics of the work environment digitalisation influence the new understanding of the very notion of work. It ceases to be only a source of earnings and is no longer associated with the routine performance of professional duties for eight hours in a strictly defined place. Work becomes what a person does, how he or she expresses him or herself and what constitutes his or her creative potential, expressed in building a unique path of educational, professional and personal development. The capital of professional achievements remains with an individual and is “transferred” to each subsequent employer, which is expressed in pursuing a career in the inter-organisational space and not in one company full time (Cybal-Michalska, 2020). One can notice a strongly distinguished need for independence and freedom of individuals, visible in education and professional work. Passion, travel, modern technologies and free management of one’s own time have become synonymous with an *individualised type of project career* (Christoph, 2020a). Thus, we can call working for a specified service contract, where the competence package of an individual optimally fits the needs and tasks of a specific employer, and the communication between these two entities takes place in two ways, mainly remotely, but also directly. This type of relationship is characterised by independence and autonomy of the project contractor, with a strong emphasis on simultaneous responsibility for the results, independent choice of tools and means of work, self-motivation and a joint training and development project with the employer, tailored to the needs of the project. It can be pointed out that the more instability, ambiguity, multiplicity of choices and solutions are found in this

type of employment, i.e., those factors which in traditional forms of full-time employment are perceived as negative, the more creativity, real flexibility and purposeful solutions reflecting the real needs of the employer/contracting party. In such a relationship, both partners, contractor-employee and mandator-employer, achieve their goal, meet their needs while maintaining the autonomy of their chosen professional values and forms of work. The prerequisite for an individual’s satisfactory performance in the project career type is a mental change in the perception of reality, which consists of a conscious acceptance of the lack of continuity, security, repetition and narrow realisation of tasks on the job. It is safe to say that a broad perspective, freedom of choices, individualisation of the execution process, freedom of movement and extraordinary creative power of action are the characteristics of employees of the future. Referring to the report *Employee of the Future* (Hatalaska, 2019), we state that changes are inevitable and the development of modern technologies is unstoppable. However, we should not be afraid of these changes but rather our failure to prepare for them.

Many people, also during the qualitative research conducted by infuture hatalaska foresight institute⁴, indicate the need for training skills in broad categories of STEM (*science, technology, engineering, math*). These are particularly valuable and sought-after specialists on the labour market, which can also be seen in Poland, where the demand for programmers is constantly growing. STEM skills will still be extremely useful in the future, but they must be combined with the so-called soft skills, with knowledge of, e.g., psychology or sociology. These competences distinguish us from machines and artificial intelligence, and this is what we, as people, are best at. It is also confirmed by the research conducted for this report (Hatalaska, 2019). Among the future competencies cited by the respondents were such qualities as the ability to actively learn, creativity (understood very broadly as the domain of not only artistic but also technological fields, abstract thinking combining different parts of our experience), the ability to share knowledge with others, the ability to cooperate with others or a problem-solving attitude. Internet users declare that in the next 5 years, they want to develop active learning, that is, understanding the impact of new information on current knowledge and skills, problem-solving and decision-making. Next in order are: the ability to share knowledge, entrepreneurship, creativity, digital skills, *design thinking* and cooperation with others.

4 <https://infuture.institute/raporty/>, [access: 30.08.2021].

EDUCATION “EVER ANEW” – THE CHANGING FACE OF SCHOOL

Moving in the ambiguous space between systemic solutions and the real needs of the environment, it can be said that a new picture of educational reality is emerging. Ewa Solarczyk-Ambrozik (2020) points out that, on the one hand, the characteristic feature of these realities involves an emphasis on the individualisation of learning paths related to the educational lifestyle, which is a reflection of the changes experienced by the modern world, and on the other hand, an emphasis on improving institutional forms, creating a framework for lifelong learning, improving and acquiring new skills necessary to move in the modern world, dominated by technological development. As E. Solarczyk-Ambrozik (2016, pp. 44–45) rightly notices,

The reality, in which the concept of lifelong learning is evolving, seems a perspective that can be defined by the direction of smart growth and the knowledge economy. (...) The increasing globalisation brings profound changes also in everyday life of individuals, who can choose between different sources of identity, among which the primary role is played by work, creating at the same time more opportunities for the development of competencies to independently plan and organise their own biographies, including professional ones. Lifelong learning is seen as a source of biographical competences defined as key ones (...).

This ability to demonstrate lifelong openness to new areas of life, learning from everyday life and acquiring specific digital competences is often confused, especially by young people, with formal and institutional learning processes imposed from outside. Meanwhile, it provides a strategic basis for the high adaptability of an individual in the world and includes specific dimensions of practical activities in the field of education created “ever anew”. Mirosława Marody (2014) emphasises that individuals currently face increasing difficulties in creating a coherent narrative of life, organised around a professional career, which, in turn, has ceased to give the individual biography not only the value of predictability but also of progress, rising to ever-higher levels of the social hierarchy. Work today does not establish the basic narrative framework of a linear, individual biography. This statement has become the basic foundation and starting point for all considerations and characteristics of the currently changing educational and professional reality. Waldemar Segiet (2018, p. 52) states that,

in the biographies of individuals, the need to change professions is more frequent, and the times of social security, combining the normalisation of income biographies, have left behind a beautiful memory. In their biographies, people are more

likely to adopt strategies for adapting to the new demands of the labour market, and their conduct resembles more the attitudes of the ‘tourist’ and the ‘vagabond’ than the ‘pilgrim’ (following a set route towards a known destination)”.

Thus, the modern youth form their own identity in an extremely diverse and heterogeneous reality of permanent transformations. At the moment of making important, key decisions concerning their further educational and professional life, they have to be very active and responsible, as well as able to react flexibly and adaptively to expectations addressed to them by most key stakeholders, such as family, school, employers, counsellors and pedagogues. The ability of young graduates to effectively enter the labour market and actively create their own professional future, as well as formulate important life goals, should be the basis for defining the profile of a modern school graduate (Christoph, 2020b). E. Solarczyk-Ambrozik (2013, p. 31) emphasises the need for a clear orientation of education towards the labour market, stating that,

combining lifelong learning with the needs of the labor market means, in basic terms, increasing the employability of citizens, ensuring successful careers and ease of movement between sectors, countries, as well as increasing the mobility of workers, moving from work to study and from study to work throughout life.

Knowledge alone is no longer the value in today’s world, but skills related to communication, management, critical thinking, or creativity. The changes occurring in reality, their pace and scope, make it necessary to respond to new and often unexpected challenges. The ability to adapt to change is becoming one of the most important competencies in the modern world. It is becoming most valuable today, something that should be invested in. Perhaps soon, skills management will become one of the subjects taught in schools, if such still exist. The role of education should be to prepare for life in the present world and for the world to come. Education must prepare for change. However, in order for this to happen, education itself must be able to adapt to it, to become “ever anew”. The authors of the report *Education of the Future 2020* (Kucner, Pacewicz, & Wasyluk, 2020) point to several key trends that are currently gaining importance in education and give direction for the future.

The first of them is situating *education in the post-truth era*. The current informational deformation of reality causes that education should undergo a significant correction. Educational programs at every level must equip people with knowledge and tools that enable them to take a critical look at the information stream generated in the public space. A challenge for contemporary education is to teach

the ability to objectively assess information, especially since most students cannot distinguish between false and true information when using the Internet. However, the role of education should not be so much to debunk false information contained in media messages as to provide the tools necessary for their accurate interpretation. Curricula should include teaching critical thinking and proper evaluation of arguments. It is also important that the educational system should provide more room for the free expression of opinions and debate. Another trend, already mentioned many times before, points to the issue of overloading education with theoretical knowledge and moving mainly in the sphere of abstract assumptions, detached from reality. *Education of useful competences* is currently one of the most desirable directions of development in both institutional and non-institutional forms of schooling. The challenge of contemporary education is to show the practical consequences of knowledge and equip students with tools to apply it in practice. Therefore, it is important to provide theoretical knowledge and teach skills that allow coping with real problems and social challenges. School should prepare for life in society and immunise against threats that appear along with the development of civilisation. Emphasising the connection between theory and practice is also a key condition for stimulating interest in education and sustaining motivation in the learning process. Education of useful competences includes both challenge-focused education, competence-focused education and capacity-building education (Kucner, Pacewicz, & Wasyluk, 2020).

A remarkable inspiration in the area of education for the future with useful competences is the concept of cyber parks, where Michał Klichowski (2017) highlights, among other things, the need to develop the trend of *smart learning – towards smart education* and the need to learn closer to the socio-economic environment and experiment in the natural environment (*outdoor learning concept*). There is a clear need to combine in education the space of modern technologies, online activities with independent experimentation in the natural environment and the formation of competence to independently navigate in a dynamically changing and differentiating reality. Traditionally, natural corners of cities and digital technologies were separated from each other. However, mobile technologies in urban green spaces have become an everyday and natural phenomenon in the last decade. A technologically enhanced natural surrounding provides an effective and developmentally stimulating learning environment. M. Klichowski emphasises that

the vision of an urban park extended by a digital context is extremely fascinating, or even exciting from a pedagogical perspective. Such parks can become learning environments that make it possible to get to know one's surrounding through

technologically supported exploration, while remaining close to nature and being physically active” (Kruszwicka, Duszcak, & Klichowski, 2020, p. 95).

Some of the most popular technological tools used for learning in cyber parks are an e-library, connected to a smartphone, and GPS. These tools make it possible to connect learners’ knowledge, interests, and specific location with online information and educational materials, and teachers can remotely monitor this process. Against the backdrop of the 2020 events surrounding the emergence of the COVID-19 pandemic, which has decisively changed the face of education and significantly accelerated its digitisation, it would seem that the development of a collection of cyber park facilities⁵ with high educational potential is extremely necessary and will develop in the future. This collection contains nearly 50 descriptions of park forms, both small and large architecture, and virtual objects that transform a park into a cyber park through its digital aspect. Among the educational facilities that could be found in cyber parks, Agnieszka Kruszwicka, Maria Duszcak, and Michał Klichowski (2020) list: educational journey maps, interactive fountains, musical stairs, digital trees, digital stations, digital benches, and digital water pavilions. The authors point out that while no comprehensive cyber park has yet been created in any city, guidelines for its design exist, and more and more facilities are being built that significantly transform traditional parks into hybrid versions of them. These facilities have high educational value, so making cyber park learning a reality can begin now.

So the future of education seems to be a challenge-based learning model. It involves teaching in the context of real challenges and problems. *Challenge-based Education* is closely related to building social networks that allow us to identify challenges, locate them and work to solve them, which fits into the assumptions of civic education (Melosik & Przyszczypkowski, 1998). This education model requires greater cooperation between students, teachers, parents and representatives of different communities functioning in the educational environment. Challenge-based education involves designing an educational environment to enhance the effectiveness of the learning process. It must be based on real-life problems and experiences that equip an individual with the desired competences. The complexity and multiplicity of ways of understanding competences link them to action, its determinants, planning and consequences. In each aspect, competence indicates a person’s ability to organise activities, take action, and face various consequences. Increasingly, competences become an integral part of the educational process, not reducible to either

5 <http://cyberparks-project.eu/examples>

knowledge or skills alone. Despite the diversity of ways of understanding competencies, it can be assumed that it is in them that the value and importance of the educational process are expressed (Rosalska, 2018). They determine the extent to which the education model allows its graduates to find themselves in professional, social, cultural and human realities. In practice, designing and successfully implementing a competency-oriented education model is a challenge that requires considering and linking many process components (cognitive, operational, exercise, facilitation) that serve the key purpose of education. For each contemporary person, the idea of lifelong learning is expressed precisely in learning “ever anew” from everyday life, drawing on various sources and areas of educational proposals. Therefore, education of the future will focus on the development of human potential and its key abilities, rather than deficits and attempts to make up for potential shortcomings that do not fit into a predetermined “key of test answers”.

The model of skill-building education thus appeals to the idea of combining goal-driven motivation, emotions, positive experiences, and willpower, resulting in greater engagement, effectiveness, and efficiency. Students and teachers alike take greater responsibility for the outcomes of the process and work more closely with parents and the immediate social environment. Measurable outcomes of this approach include higher attendance and completion rates of this educational pathway, among others. Skill-building education requires that skills be viewed in the context of age and life goals. Young people will have different goals; mature people will have different goals and opportunities as they enter old age. Increasing life expectancy and activity make understanding career (including work) change. E. Solarczyk-Ambrozik (2016, p. 41) emphasises that

most concepts explaining the phenomenon of career choices assume that certain individual characteristics and elements of the environment provide individuals with opportunities for learning experiences. Career education becomes a predictable trajectory of developmental tasks realised through the formation of skills necessary for career development in various organisations.

New experiences and opportunities resulting from the development of new media, smart technologies, new solutions supporting people of different ages, and new forms of professional, social and cultural activities are constantly becoming a part of generations. This approach aims to create conditions to recognise a person’s potential and identify opportunities for its use. The second requirement is to create conditions conducive to action focused on using individual predispositions and adapting challenges to the learner’s expectations. The question that arises is whether the modern school can create such conditions?

*Strategy of human capital development 2020*⁶ assumes that school education should be a stage of life during which we acquire the most important knowledge and skills enabling us to function satisfactorily and creatively in society and on the labour market. At this stage of life, we also develop key attitudes towards ourselves and other people and convictions concerning the principles shaping modern work environments. Agnieszka Cybal-Michalska (2020) indicates a relationship between the proactive and pro-developmental attitude of youth and experiencing success in life and education. A graduate of a contemporary school characterised by pro-activity is a person who possesses authentic cognitive flexibility, a vision of well-being that he or she wishes to achieve in the future, and a strong sense of agency, resulting from intrinsic motivation. Such shaped convictions among young people increase their chances for effective movement on the dynamic labour market and self-realisation in their personal lives. Due to its universality, the educational system is a natural mechanism making it possible to identify and support the development of people with the greatest potential and at the same time provides an opportunity to equalise chances at an early stage of life. The quality of teaching becomes a priority, including modern teaching methods relating to the activity and subjectivity of an individual and the quality of competences obtained at school by young people. Renata Tomaszewska (2020) states that the basic determinants of change in education should be greater support and development of students with outstanding potential while further reducing the number of low-achieving students. It is necessary to invest heavily in teachers' competencies to work with gifted students and equip them with specific tools and scenarios because this area is lacking. There is a lack of competence, tools and methods, and shortcomings in the school's organisational and time system and teachers' willingness. Eugeniusz Piotrowski (2020, p. 26), referring to the issue of supporting gifted students as an important condition for social progress, states that

it is gifted individuals who can better understand the growing complexity of world phenomena and reduce the feeling of uncertainty it brings. Having a broader and better knowledge of the world, they are also able to understand themselves and others better. Increased interest in this group of students is reflected in numerous publications, as well as in the emergence of research institutions whose activities are aimed at coordinating research, collecting and sharing information, and improving the work of teachers. [...] The fact that in most European countries, including Poland, individual differences among pupils are increasingly respected should be greatly appreciated.

6 <https://archiwum.mriips.gov.pl/praca/strategie-i-dokumenty-programowe/strategia-rozwoju-kapitalu-ludzkiego-srkl---projekt-z-31072012-r/>, [access: 01.10.2021].

Such an approach corresponds to the second postulate for changes in education, where R. Tomaszewska (2020) stresses the need to strengthen key competences of young people and develop their diversity, entrepreneurship, creativity and ability to learn independently at all school stages. Thirdly, the presence of employers as practitioners creating the labour market is essential in educational programs. It is hard to disagree that the socio-economic environment and entrepreneurs are the most reliable source of knowledge about the short and long term demand for qualifications. In times of intensive digitisation of work environments, there is a clear need to build and develop the competences of graduates corresponding to current and projected needs. The main task set by the modern school is to teach how to apply knowledge and how to create it. Therefore, the hierarchical model of education, which assumes discipline and conformism on the part of the student, and the concept of linear progression through the successive stages of the system to enter the labour market, where one works entire life in one profession, definitely does not meet the needs of students or the expectations of employers. The question is how to respond to learners' current needs and the demands of a changing socio-economic environment?

One of the proposals has been presented by the authors of the report *Education for the Future 2020*. Their study (Kucner, Pacewicz, & Wasyluk, 2020) describes the phenomenon of the *educational smorgasbord* claiming that education of the future will have a "patchwork" character, composed of many different elements that will form a multidimensional whole. The differentiation process of the education system will change the approach to the educational offer. It will not be a system based on educational offers but educational choices made by its participants. The future education will be based on specific and clearly defined choices of those who participate in the educational process. They will choose from the educational offer what they need at the right stage of their life development, regardless of whether it is formalised or not. A good example of an educational smorgasbord is the concept of my-university. In the formula of my-university, education takes place through choices made by the participants in the educational process (Solarczyk-Ambrozik, 2009). They decide on the subject matter, the content and the intensity of the educational process. My-university is an example of a far-reaching personalisation of the educational process and its flexibility. My-university is an educational formula in which the educational offer is expanded according to the arising needs, and participants in the educational process have a greater influence on its creation and adjustment to their expectations. The concept of my-university is seen as quite close to the future of university education. It is increasingly often said that the educational model of universities will not be predetermined but will

be co-created with the significant participation of students as subjective co-creators of individual development paths. The idea of my-university is realised in the educational formula defined as adaptive learning (Wach-Kąkolewicz & Shelest, 2014), which consists of adapting the learning process to students’ needs, competencies, and abilities. In the adaptive learning model, it is not that the participant of the educational process must adapt to the curriculum, but it is the curriculum that is adapted to the participant’s capabilities. It is possible thanks to modern technologies (mainly artificial intelligence algorithms and e-learning platforms), which facilitate the personalisation of content and knowledge delivery. The starting point is the same for all students, and learning differentiation occurs later and depends on the students themselves. This learning model aims to deliver specific knowledge, make the educational process more attractive, and personalise the content and learning.

The outlined directions of transformations in contemporary educational models reflect the developmental and civilisation challenges and draw attention to the urgent need for the complete and qualitative use of the potential inherent in people, i.e., active subjects of the learning society. As the authors of *The Learning Revolution*, Gordon Dryden and Jeanette Vos (2003), point out, contemporary education and school policies fail to meet this need. The most effective learning comes from the learner’s own motivation to learn, which in a well-prepared environment and with the right tools, transforms the learner into a positive self-starter who will grow up to be an informed individual who continues his or her education throughout life. Until this day, in many countries, including Poland, it has not been possible to create such conditions at school in the sense of uniform systemic solutions. Each person has a unique style of learning, working and thinking. Still, in most schools, despite many debates and publications on the diagnosis of learning styles, education is uniformly conducted in an abstract, academic and theoretical way with the method of one-sided transmission. Scientific research shows (Dryden & Vos, 2003) that this form of learning is assimilated by only 30% of people and the remaining 70% are characterised by diverse styles of assimilating knowledge and analysing reality. We live in a time when most people have the opportunity to extend their working lives even to the age of 80. In this context, the burning debate for contemporary politicians should not be about financial security for the ageing population but rather about creating for people at the “third age” (Konieczna-Woźniak, 2020) conditions to actively participate in a community of lifelong learners. In the context of these issues, it is safe to say, quoting Jeremy Rifkin (2012, p. 315), that

the current school model makes it the most outdated institution in the world. It does not foster open learning, but rather exhibits the characteristics of a mechanical arrangement that promotes a student who will demonstrate a specific response to a strictly premeditated stimulus. School no longer provides knowledge for several dozen or even more years, therefore, an important and seemingly one of its key tasks is to equip people with the ability not only to apply knowledge, but also to create it,

i.e., to teach creative learning about the world “ever anew”. The issue of creativity in the work of teachers (Christoph, 2021) is very timely, interesting and relevant today in the context of conducting further research explorations and satisfying the needs of the education sector. The very interest in creativity can be explained, among other things, by the fact that it is a necessary attribute of being in the world of a modern human being, an employee of the future. The contemporary world, dynamically changing in all spheres of human life, on the one hand, causes anxiety, introducing imbalance, disharmony and disturbing the hitherto habits or patterns of behaviour, and on the other hand, it activates, motivates and develops, posing various, unusual challenges, which can be met only by an individual thinking in an unconventional, innovative way, situating himself beyond the pattern.

SUMMARY

Following the logic of the problems included in the text structure, it is possible to distinguish key tasks facing education, which should be reflected in the educational policy aimed at increasing the effectiveness of the school and developing digital competences (Sijko, 2012). They are:

1. Building a stable identity of adolescents in the face of the world’s ambiguity. In this area, changes in education should evolve in the direction of increasing young people’s sense of agency and taking responsibility for their lives; creating the ability to formulate general and individual goals, making life choices, making educational and professional decisions; raising awareness of young people that the life capital is their individual property, not an institutional one; developing creative thinking – out of the box; improving digital competences and wisely using them; strengthening self-esteem.
2. Increasing the effectiveness of activities in formal education influences the maturity of citizens and the readiness to cope with the challenges of civilisation. In this area, changes in education should evolve in the direction of strengthening the ability to independently deal with reality as well as plan-

ning and implementing individual action strategies (a modern human – free and independent); strong connection of hard elements (science, technology, engineering, logic) with soft skills which helps use knowledge; shaping the ability to actively learn, share knowledge, cooperate, solve problems constructively; adapting the core curriculum to the new image of the educational reality defined by individualism and technologies.

3. Expanding the flexibility of the education system in the context of change. In this area, changes in education should evolve in the direction of giving young people the ability to live in the instability, unpredictability of the world and teach them how to authentically accept such a requirement; organising education around values: effective communication, knowledge management, critical thinking, selection and creation of non-standard solutions, adaptability.
4. Shaping the practical and systemic strategy of actions towards patchwork education, in which many different elements create a multidimensional whole. In this area, changes in education should evolve in the direction of departing from a ready-made, rigid educational offer in favour of the educational choices of individuals; organising the education of useful competences (less theory, more practise) based on challenges, projects, developing proactive and pro-development attitudes; investing in talented students whose intellectual and creative capital creates a real perspective of life beyond the scheme.

It is needed to underline that life beyond the scheme is the ability of modern man to cope with the key challenges of educational, social and economic life. David Kelley and Tom Kelley (2019, p. 19), the authors of *Creative Confidence. Unleashing the Creative Potential within Us all*, state that

in essence, creative confidence is a belief in one’s own ability to make a difference in the world around them. It is the conviction of an individual that he or she can accomplish something that he or she has decided he or she will accomplish. It is this self-confidence, this belief in one’s own creative abilities that is at the very heart of innovation,

which is crucial in a knowledge-based economy. And this is where the discrepancy between education and the labour market, its needs and expectations, becomes apparent. First, it is puzzling to discuss the need for a link between education, school and what is happening in the socio-economic environment. I would like to stress that extremely important functions in education, apart from the obvious provision of knowledge and individual personal development of a human being, is the preparation of young people for effective entry into the labour market, ful-

filling the role of responsible citizens in social life, and equipping them with the ability to learn throughout life. Secondary schools prepare diverse divisions and class profiles in their educational offerings, while universities offer specialisations and specialities within particular fields of study. In this context, cooperation with the socio-economic environment, internships and apprenticeships with specific employers and the possibility of foreign trips for students are becoming increasingly important. Meanwhile, curricula are still saturated with theory and a huge quantity of facts to be memorised, which has long been written about and discussed, and they lack a certain amount of freedom, emphasis on practical experience, lack of “creative confidence”. These deficiencies are further strengthened by test methods of checking knowledge, which rigidly require students to write themselves into the answer key, deprived of freedom of interpretation and the possibility to demonstrate the imagination. Creative thinking and creativity are much broader and more universal notions than people usually think. Moreover, they are not limited only to artistic areas. D. Kelley and T. Kelley (2019, p. 19) say:

We consider creative thinking to mean using our imagination to create something new that the world has never known before. Creativity occurs when we have the opportunity to come up with new ideas, solutions or assumptions. And we believe that everyone should have access to this resource.

Here comes the second reason for the gap between education and the labour market, as both modern teachers and students in Poland do not have access to the mentioned resources. In dynamic change and networked education, teachers need to start from within themselves and become companions in their students’ individual development. It seems obvious that the teacher is often faced with a pragmatic choice between a quick and cost-effective way of conducting lessons using the spoon-feeding method, transferring content consistent with the core curriculum in the classroom system, and the requirements of innovative reality, students’ expectations and creative way of implementing tasks. Teachers tired with excessive bureaucracy (Wołk, 2020), a huge number of detailed ministerial requirements and forms to be filled in, burdened with responsibility for every aspect of student’s school functioning, pushed against the wall of exorbitant expectations of demanding parents, at the very beginning of the school year are tired and the enthusiasm for non-standard activities, going beyond the mould, weakens considerably. Observing the waning enthusiasm of teachers sitting at the Teachers’ Council, one may conclude that it will be easier for them to adapt to the prevailing system of educational policy using methods known and tested in previous years, to focus on contents and facts than to shape competences desired and expected by the

socio-economic environment. It would require starting the change from oneself, shifting the teachers’ way of thinking and then translating it into individual (feasible) and not systemic practice, using new methods and techniques of teaching, the effects of which will be seen in a longer-term process, not necessarily ending with test verification. The vast majority of teachers use creative methods of work only incidentally because of the requirements included in the core curriculum and their responsibility for the results of teaching. Meanwhile, people with creativity and creative confidence have a greater impact on the world around them. It may mean, for example, getting involved in the affairs of the school our child attends, creating an innovative and inspiring community meeting place or engaging social media in charitable activities. It can be concluded that the ability to think creatively is not a rare gift that only a few individuals can enjoy but a natural part of human reasoning and behaviour. However, this ability very often is blocked by, among other things, limitations in the education system, cultural requirements, the way of upbringing and childhood experiences. Nevertheless, it is possible to unleash and develop this capacity, which can produce far-reaching and quality effects, not only on individual, organisational, economic and social levels.

Due to the dynamic economic development, appropriate steps are planned, which are included in strategic documents. In the Europe 2020 strategy (European Commission 2010), one of the three priorities is the so-called intelligent development, which means that the economy is based on knowledge and innovation. In practice, the development of an economy based on knowledge and innovation cannot be successful without the resource of appropriately educated employees who should be creative and competent in the field of technology. It is connected with the necessity to educate – among others – school youth to use information and communication technologies every day, for personal and later professional purposes. The use of new technologies in shaping digital competences brings very good results. It gives creative opportunities to use new technologies in all areas of life, the ability to search, evaluate, process and co-create information to effectively participate in modern technology society. Therefore, the conclusion is that these technologies can successfully increase the efficiency of schools’ work. However, it is important to understand that the goal of education is not an only assessment but also – perhaps crucial for the future – digital competences and the ability to use them creatively and responsibly. The importance of such competences in a modern economy is emphasised by all strategic documents, including Polish (Sijko, 2012) and European, without exception.

References

- Christoph, M. (2020a). Pracownik a pracodawca. Budowanie dwustronnej relacji w kontekście zmian na rynku pracy. In E. Solarczyk-Ambrozik, M. Christoph, & R. Konieczna-Woźniak (Eds.), *Edukacja dorosłych a planowanie karier edukacyjno-zawodowych* (p. 199). Wyd. Naukowe UAM.
- Christoph, M. (2020b). Młodzi na rynku pracy, czyli kogo chcą zatrudniać współcześni pracodawcy. In M. Christoph & S. Wawrzyniak (Eds.), *Spółeczno-edukacyjny potencjał szkoły a rynek pracy* (p. 280). Wyd. Naukowe UAM.
- Christoph, M. (2021). Zmieniająca się szkoła wobec wymagań rynku pracy, i nie tylko. *Forum Pedagogiczne*, 1(11).
- Cybal-Michalska, A. (2020). Proaktywność jako strategia doświadczania sukcesu w karierze. In M. Christoph & S. Wawrzyniak (Eds.), *Spółeczno-edukacyjny potencjał szkoły a rynek pracy* (s. 275). Wyd. Naukowe UAM.
- Dryden, G., & Vos, J. (2003). *Rewolucja w uczeniu się*. Zysk i S-ka.
- Hatalska, N. (2019). *Pracownik przyszłości. Raport*. Infuture Hatalska Foresight Institute.
- Hatalska, N., & Skrzypek, N. (2019). Gen Z. *Jak zrozumieć dziś pokolenie jutra*. Infuture Hatalska Foresight Institute. <https://infuture.institute/raporty/pokolenie-z/>
- Kelley, D., & Kelley, T. (2018). *Twórcza odwaga. Otwórz się na design thinking*. MT Biznes.
- Klichowski, M. (2017). *Learning in CyberParks. A theoretical and empirical study*. Wyd. Naukowe UAM.
- Komisja Europejska. (2010). *Komunikat Komisji KOM(2010) 2020 wersja ostateczna: Europa 2020. Strategia na rzecz inteligentnego i zrównoważonego rozwoju sprzyjającego włączeniu społecznemu*. https://ec.europa.eu/eu2020/pdf/1_PL_ACT_part1_v1.pdf
- Konieczna-Woźniak, R. (2020). Kariera (w) starości. Satysfakcja z życia, czyli sukces sukcesów. In E. Solarczyk-Ambrozik, M. Christoph, & R. Konieczna-Woźniak (Eds.), *Edukacja dorosłych a planowanie karier edukacyjno-zawodowych* (s. 171–189). Wyd. Naukowe UAM.
- Kruszwicka, A., Duszczak, M., & Klichowski, M. (2020). Edukacyjne obiekty w cyberparkach: Analiza Pool of Examples projektu COST Action TU1306. In E. Solarczyk-Ambrozik, M. Christoph, & R. Konieczna-Woźniak (Eds.), *Edukacja dorosłych a planowanie karier edukacyjno-zawodowych* (s. 99–102). Wyd. Naukowe UAM.
- Kucner, A., Pacewicz, G., & Wasyluk, P. (2020). *Edukacja przyszłości 2020. Raport*. <http://www.uwm.edu.pl/trendy/gfx/raporty/EDUKACJA%20PRZYSZ%20C5%81O%C5%9ACI%202020.pdf>
- Marody, M. (2014). *Jednostka po nowoczesności. Perspektywa socjologiczna*. Wydawnictwo Naukowe Scholar.
- Melosik, Z., & Przyszczypkowski, K. (Eds.). (1998). *Wychowanie obywatelskie. Studium teoretyczne, porównawcze i empiryczne*. Wydawnictwo Edytor.
- Piotrowski, E. (2020). Wspomaganie rozwoju uczniów zdolnych jako ważny warunek postępu społecznego. In M. Christoph, & S. Wawrzyniak (Eds.), *Spółeczno-edukacyjny potencjał szkoły a rynek pracy*. Wyd. Naukowe UAM.
- Rifkin, J. (2012). *Trzecia rewolucja przemysłowa*. Sonia Draga.

- Rosalska, M. (2018). Kompetencja wyróżniająca jako element projektów karierowych. In E. Solarczyk-Ambrozik & M. Barańska (Eds.), *Uczenie się przez całe życie. Rozwój–kariera–praca*. Wyd. Naukowe UAM.
- Segiet, W. (2018). Edukacja i praca w jednostkowej biografii. Problem nadawania znaczeń. In E. Solarczyk-Ambrozik & M. Barańska (Eds.), *Uczenie się przez całe życie. Rozwój–kariera–praca*. Wyd. Naukowe UAM.
- Sijko, K. (2012). Nowe technologie w edukacji: dwa podejścia. *Polityka Społeczna*, 1.
- Solarczyk-Ambrozik, E. (2009). *Kształcenie ustawiczne w perspektywie globalnej i lokalnej. Między wymogami rynku a indywidualnymi strategiami edukacyjnymi*. Wyd. Naukowe UAM.
- Solarczyk-Ambrozik, E. (2013). Uczenie się przez całe życie jako rzeczywistość edukacyjna. In E. Solarczyk-Ambrozik (Ed.), *Całozyciowe uczenie się jako wyzwanie dla teorii i praktyki edukacyjnej*. Wyd. Naukowe UAM.
- Solarczyk-Ambrozik, E. (2016). Zmiany we wzorach przebiegu karier a całozyciowe uczenie się. In E. Solarczyk-Ambrozik (Ed.), *Doradztwo zawodowe w perspektywie całozyciowego uczenia się*. Wyd. Naukowe UAM.
- Śliwerski, B. (2009). *Problemy współczesnej edukacji. Dekonstrukcja polityki oświatowej III RP*. Wydawnictwa Akademickie i Profesjonalne.
- Tomaszewska, R. (2020). “Ogrodnicy i rośliny”. Współczesna edukacja a rynek pracy przyszłości. In M. Christoph & S. Wawrzyniak (Eds.), *Społeczno-edukacyjny potencjał szkoły a rynek pracy* (p. 306). Wyd. Naukowe UAM.
- Wach-Kąkolewicz, A., & Shelest, O. (2014). Wyzwolić zaangażowanie, czyli o konstruktywizmie w e-learningu. In J.D. Antoszkiewicz & M. Rocki (Eds.), *E-edukacja w praktyce. Wyzwania i bariery* (pp. 55–65). Foundation of Promotion and Accreditation of Economic Faculties.
- Wołk, Z., (2020). Edukacja formalna na koniec drugiej dekady XXI wieku w kontekście edukacji ustawicznej (symptomy kryzysu). W: E. Solarczyk-Ambrozik, M. Christoph, & R. Konieczna-Woźniak (Eds.), *Edukacja dorosłych a planowanie karier edukacyjno-zawodowych* (s. 74–80). Wyd. Naukowe UAM.
- <http://cyberparks-project.eu/examples>
- <https://archiwum.mrips.gov.pl/praca/strategie-i-dokumenty-programowe/strategia-rozwoju-kapitalu-ludzkiego-srkl---projekt-z-31072012-r/>
- <https://infuture.institute/raporty/>