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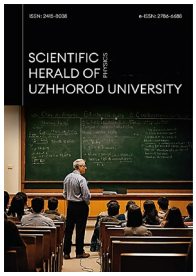

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Pedagogical design of early career guidance in the play activities of older preschool children

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Abstract

Relevance. Career guidance within early education is an important aspect of raising a child and developing the skills necessary for further successful career and self-discovery. In this regard, the study of professional orientation in gaming activities using the pedagogical design is a topical issue when educating older preschool children.

Purpose. The purpose of this study was to investigate the aspects of the use of pedagogical design tools during the play activities of older preschool children with early career guidance.

Methodology. In this paper, methods of analysis, comparison, generalization are used.

Results. As a result of the study, it was possible to investigate the aspects of project activities in game forms of early career guidance work with older pupils of preschool educational institutions. The periodization of vocational guidance according to E. Ginzberg was also studied. In this study, the early period of career guidance of the child "fantasy" is disassembled and carefully investigated. The study also presents options for gaming activities in modern preschool education, as elements of early career guidance work with older preschool children. The scientific study highlighted the tools of play activities during early career guidance for older preschool children, namely the use of the Lapbook project, augmented reality and artificial intelligence systems, as well as the MeTycoon game, which includes video materials and information about professions.

Conclusions. The results of this study can be used by researchers and scientists investigating the issue of using pedagogical design in vocational guidance through the game, as well as educators of preschool educational institutions who are engaged in early career guidance.

Keywords: career choice; gamification; information space; education; self-determination.

Introduction

The use of information and communication, as well as modern digital technologies to create a holistic educational environment in the pedagogical practice of preschool teachers not only changes the educational process of pupils, but also requires a revision of the content, methodological approaches, and organization of the educational process of older preschool children. However,

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the introduction of digitalization in preschool education is accompanied by some difficulties associated with the optimal use of resources brought by the technological advance. In this regard, there is a need to investigate the issue of pedagogical design in the context of early career guidance in the gaming activities of older preschool students. The issue under study was to investigate the use of pedagogical design tools for early career guidance for pupils of preschool educational institutions. Career guidance in early education is about providing children with information about the various professions, the opportunities, and requirements associated with each of them, and helping preschool children make informed decisions about their future education and career. Thus, children will be able to choose the path that best suits their interests and abilities, which will ultimately lead to an increase in the level of education and labour productivity, an improvement in socio-economic development and the well-being of the people.

Scientists J. Curry & A. Milsom [1] are convinced that the approach to career development should be individual and consider the characteristics and needs of each student. Researchers state that it is important to consider each child's personal values, hobbies, preferences, and strengths when picking a career path, and develop a plan accordingly. The researchers argue that a personalized approach will help students find job satisfaction and success in their careers. It is necessary to investigate this issue more carefully when educating and selecting professional guidelines for older preschool children. According to S. Abildina *et al*. [2], the lexeme "design" is interdisciplinary in nature, and therefore the concept of pedagogical design can have different interpretations. Scientists address the fact that in the field of the theory of knowledge there are several areas, such as behaviourism, cognitivism, connectionism, and constructivism, which relate to the learning process, and therefore, they include the concept of learning through response to various stimuli, the experience of reorganization to give meaning to external stimuli, create a system and make decisions, form knowledge through co-creation and create conditions for independent active cognition. As a result, the concept of "pedagogical design", as stated in the study by the researchers, is a set of innovative approaches and teaching methods designed to improve the efficiency and convenience of professional teaching practice [3; 4]. It is necessary to investigate the issue of pedagogical design from the side of early career guidance of older preschool children thanks to gaming activities.

G.O. Abdullayeva & I. Menglibay [5] argue that choosing a future profession is a complex and multifaceted process that depends on many factors. A significant role, according to scientists, is played by the motivational-value sphere of the subject, which determines their interests, values, beliefs, and needs; features of individual-personal characteristics and social factors. Researchers focus on the fact that interest in a certain profession can be stimulated by its high demand in society, while the low demand for a profession can neutralize interest in it. According to the authors, stereotypical perceptions of prestige, economic well-being and prospects also influence the preferences of young people who seek to pick a future activity. However, the choice of a profession depends on many factors, and each person makes their choice based on their beliefs, interests, and ideas about the world and themselves in it. It is necessary to investigate the issue of early career guidance for preschool children more carefully, given the lack of many well-established aspects in them, in comparison with adults, such as stereotypical thinking, an established motivational-value sphere.

Researchers A.F. Cruz-Eraso & C. Gonzalez-Serrano [6] argue that the use of games can be an effective method to motivate pupils through career guidance. Games can also help children better understand how their personal characteristics might fit into different professions or industries, which can encourage more informed decisions about their career paths [7; 8]. It is important to examine the features of the use of gaming activities in the career guidance of older preschool children. In turn, A. Parola *et al*. [9] draw attention to the effectiveness of digital games in career guidance. According to the researchers, the use of digital games for career guidance and career development is becoming increasingly popular. However, despite the increasing interest in this issue in relation to preschool children, there is a relatively small number of studies evaluating the effectiveness of such games in career guidance and career development, so it is necessary to carefully investigate the issue of using gaming activities in the career guidance of older preschool children.

The purpose of this study was to highlight the nuances of using pedagogical design as a tool for early professional orientation in the play activities of older preschool children.

Literature Review

There are many studies in the field of pedagogical design of early career guidance through play activities at preschool age. Some of them were carried out by S. Mohamed *et al*. [10]. Researchers have studied the role of early career counselling in preschool children and its impact on future career choices. According to M. Muslihati *et al*. [11], an important aspect in choosing a professional activity is the persona of the educator and teacher, based on the experience and knowledge of which, children develop the necessary skills and examine their preferences and capabilities. According to L. Bonoli [12], one of the key elements of the work of a professional consultant is the development of individual career plans for clients, considering their needs and life goals, as well as resources and opportunities. E.A. Amanbaeva *et al.* [13] researched vocational guidance and noted that it is an interdisciplinary area that combines knowledge from various fields of human and social sciences, such as psychology, sociology, medicine, economics, philosophy. As a result, it is possible to compare different definitions of career guidance and highlight its most important characteristics. The study of gamification and the use of gaming activities in career guidance was carried out by scientists A. Meluso *et al*. [14], who argued the effectiveness of the use of games in the career guidance of preschool children. These authors also studied the influence of games on future careers. I. Dunwell *et al*. [15] investigated the digital development of the career guidance game MeTycoon.

In a study by Setuju *et al*. [16], an essential aspect of child development, as well as promoting self-determination in the modern information and educational

space, is the project-based pedagogical design model in blended learning, which combines the conventional classroom format with online technologies and focuses on solving real problems and projects. In turn, according to C.P. Bhakti *et al*. [17], modern digital technologies can be useful in the implementation of career guidance work with preschool children. They allow presenting information about various professions in an interesting and accessible way, e.g., through games, multimedia presentations, video tutorials. This can help the child to better understand the essence of the profession, its features and requirements, and also helps make an initial assessment of one's interests and inclinations. Furthermore, such technologies can enable hands-on experience, for example through virtual job simulations, which also contributes to more informed career choices in the future. According to D.N. Issabaeva *et al*. [18], the goal of pedagogical design is an integrated approach to creating an educational environment and educational process that helps to flexibly change and adapt a single system based on educational data, ways of interacting with students and educational material according to the requests of the latter.

Based on the research of scientists, the study of the issue of career guidance for preschool children through pedagogical design during gaming activities is an important aspect of the modern scientific field.

Materials and Methods

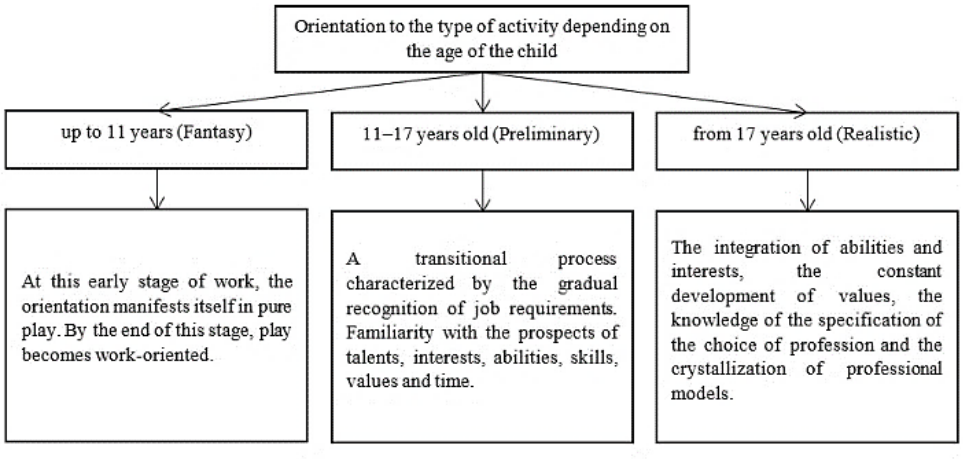
The MeTycoon game was used as research materials, as an example of a well-developed pedagogical program. Its possibilities, examples of application and forms of adaptation were considered [15]. The study also examined games based on augmented reality (AR) for the career guidance of preschool children, as research materials. In the game, children were able to select characters associated with different professions and interact with them, completing tasks and learning about each profession. In this way, AR-based play has helped young children understand what professions exist and what they mean [19]. Thus, the pedagogical design that combined the MeTycoon game and the AR-based game consisted of several stages. At first, the children played MeTycoon, getting to know different professions. The older preschool children then used the AR app to explore their chosen profession in more detail. Using AR and the MeTycoon game together helps kids gain a more profound understanding of different professions and how they relate to various industries. It also helps children develop the skills needed to perform these professions.

In this study, the analytical method of scientific research, comparison, generalization was used. The use of these methods helped obtain more accurate and complete results of the study. In this paper, the analytical method was used to investigate current trends in the development of early career guidance work with children in preschool educational institutions, as well as to define the concepts of "career guidance", "pedagogical design", and other terms related to the research topic. Using the method of analysis, the key aspects of career guidance were identified, such as the process of pedagogical design, as well as the use of game forms of activity for early career guidance of older preschool children. In addition, the analytical method of scientific research was used to investigate modern trends in education, which affect the development of early career guidance, such as the use of innovative technologies, modern approaches to learning and the introduction of innovative models of preschool education. Thus, the method of analysis helped reveal various aspects of early career guidance and gain a more complete understanding of current trends in the development of this area. This method helped to highlight the main nuances associated with early career guidance for preschool children, as well as to analyse the existing tools used in this area.

In this scientific paper, the comparison method was used to compare various forms of play activity and the use of different pedagogical tools in the early career guidance of older preschool children. This method of scientific research helped identify the main aspects of each approach to early career guidance at preschool age to achieve the goals of self-determination in choosing a future career for a child. The method of generalization helped systematize and summarize the previously obtained results of research in the field of early career guidance for preschool children. Thanks to generalization, the study revealed that modern solutions in this area include the use of pedagogical design and play activities for older preschool children. Based on the method of generalization, the study covered aspects of pedagogical design as a set of measures aimed at creating an effective educational environment for the implementation of certain educational goals. Furthermore, using this method in a scientific study, the nuances of the gaming activities of older preschool children were studied, as an important aspect of early career guidance. Generalization also helped investigate the features of games as a way of teaching children the basics of the necessary skills that may be useful to them in the future. Thus, the generalization method helped analyse and systematize the study results and reveal that the use of pedagogical design and game activities of preschool children are effective modern solutions in this area.

Results

Early career guidance is essential for a child's successful professional development. At preschool age, children begin to form their understanding of the world and themselves in it, as well as learn basic skills and abilities. Early career guidance helps children to realize their interests, talents, abilities and habits, which contributes to a conscious and purposeful choice of profession in the future. Children of older preschool age are already beginning to establish ideas about professions and the world of adults. It is important that parents and educators help them in this process by providing information about various professions, showing how they relate to everyday life, and stimulating interest in work and achievement of goals. Thus, children will be ready for an informed choice of profession in the future. In choosing a future profession, a child undergoes three periods (Figure 1), each of which differs in the type of activity and perception of the world.



Career guidance periods according to E. Ginzberg

Source: compiled by the authors based on I. Faheem [20].

Early career guidance work with older preschool children is in the "fantasy" phase – children are just beginning to dream of professions that seem interesting and attractive to them. An example of this is popular professions that children see on television or in films. In this period, children do not yet know the realities of picking a profession and do not realize what efforts and time costs may be required to achieve their goals. The second period – preliminary – occurs during the transition period from childhood to adolescence. In this period, adolescents begin to consider the possibilities of a future profession more seriously and try to determine their interests, abilities and values, as well as how these qualities can fit into different professions. The third period – realistic – begins after graduation or during the period of study in educational institutions. During this period, adolescents are more clearly aware of their interests, abilities, and values, and begin to select professions that correspond to their preferences and capabilities. In this period, the assessment of the requirements necessary to achieve success in the chosen profession also takes place. These three periods in the career choice process may vary depending on each person's individual differences and life experiences.

For successful early career guidance of older preschool children, it is necessary to create special conditions that include a variety of games, activities, and events aimed at developing the interests and creative abilities of children. It is important to consider the individual characteristics of each child, his age, social and cultural needs, to help them determine their interests and inclinations most effectively. Career guidance is the process of aiding and providing information to people in picking a profession, preparing it, adapting it and establishing it at work [21; 22]. The term "career guidance" can be used as a synonym for career counselling, where a specialist helps a person select the most suitable profession or career path based on their interests, abilities, and goals [23; 24]. However, in a broader sense, career counselling can also include other types of interventions, such as organizing company tours, providing information on the labour market, conducting vocational trainings and games when it comes to early career guidance. The purpose of such events is to help in picking a career path and create conditions for the development of their professional skills and competencies.

In today's educational context, higher-order thinking skills and 21st century skills are becoming increasingly important for a successful career in the future. It is the increase in the competence of teachers of career guidance and counselling that is a key factor in the development of career guidance strategies for students. Career teachers should use a variety of methods and tools to help students discover their interests and talents, as well as develop skills that will be useful in their future careers. This may include conducting quests, play activities, trainings [11]. Professional orientation includes several aspects: vocational education (helps learn about various professions, their requirements, and opportunities), vocational counselling (helps students decide on the choice of a profession that is most suitable for their personality and capabilities), psychological support (helps cope with psychological problems and feel more confident in the future). All these aspects help form motivated professional intentions among young people and contribute to the development of their potential according to socio-economic needs [13]. It is important to understand the fact that vocational guidance is an important aspect of personality development, and therefore, the choice of a future profession at preschool age stimulates the child to develop and shape themselves through the lens of the chosen direction.

Game activity has a positive impact on the education and upbringing of children. Game tasks and exercises can be internally motivating and interesting for students, which contributes to better assimilation of the material and a more in-depth understanding of the topic. Furthermore, games can help children develop skills in cooperation, communication, problem-solving and critical thinking, which can be useful both in school and for early career guidance [14; 25]. However, it must be remembered that games cannot replace conventional teaching methods but should be used as an additional tool in education and preparation for picking a future profession. Moreover, to achieve the maximum effect, games must be properly organized and correspond to the level of development and interests of students, especially when it comes to older preschool children.

For career guidance, games that are created based on digital technologies are also used. An example of this kind of game is MeTycoon, which provides help and information support when choosing a career. In the MeTycoon game, elements of the pedagogical sphere (video, information elements) are integrated into the mechanisms of the game, which, as a result, facilitates the educational process for preschool children [15]. The game features various professions, such as teacher, doctor, cook, musician, and preschool children can explore each of them, learn more about the work and skills needed, and make decisions and solve problems related to each profession. MeTycoon offers users the opportunity to analyse how their skills and interests can be applied in different sectors of the economy. During the game, children pick a profession in which they would like to develop, thanks to various tools and resources within the game, preschool children can play a variety of stories related to the chosen profession. Apart from the game elements, MeTycoon also contains a wealth of content, including job descriptions and more. These materials help preschool children to better understand the profession and make informed decisions about their career. As such, MeTycoon is a fun and innovative way to help children identify their professional interests and intentions, as well as gain valuable insights into different industries and professions.

For early career guidance of preschool children, the technique of creating a Lapbook is used. A Lapbook is a cardboard folder containing material on a specific topic that needs to be studied. Inside the folder there are various game and educational materials designed in the form of mini-books, pockets, windows, accordion books, rotating circles, envelopes of various shapes, cards. The Lapbook performs many functions in early career guidance in the gaming activities of older preschool children (Figure 2).

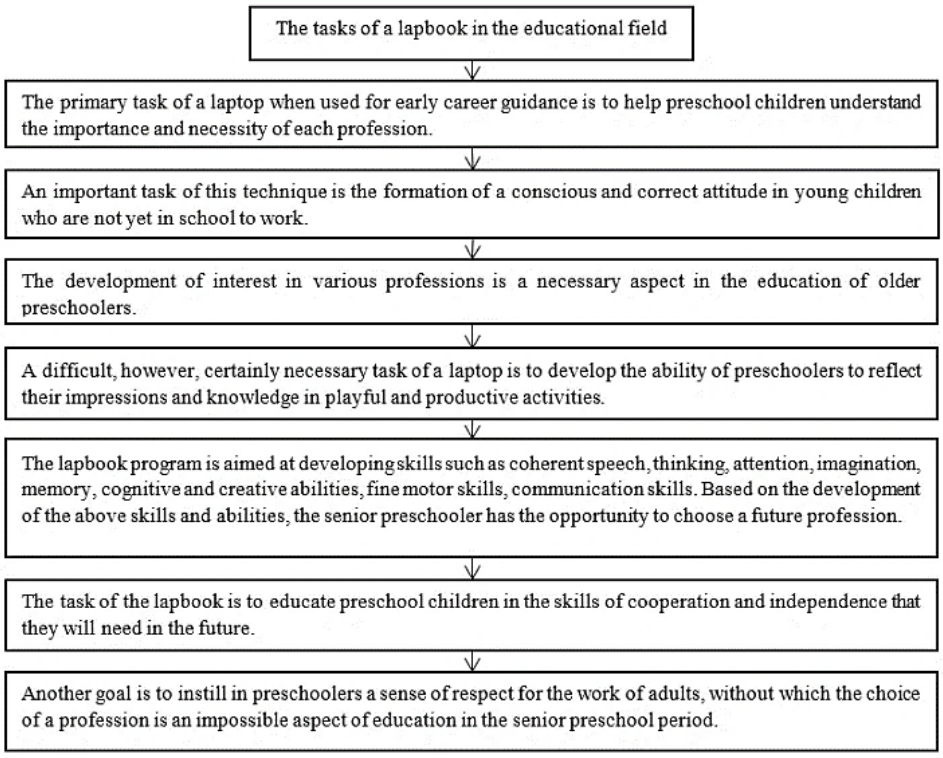


Figure 2. Tasks of using a Lapbook for older preschool children
Source: compiled by the authors based on I.I. Kariy & N.N. Farafonova [26].

Digital technologies have become an integral part of society, including education, business, culture, and many other areas. Kazakhstan is also experiencing a rapid development of the digital sphere, which requires not only the ability to use innovative technologies, but the ability to adapt to a changing environment and quickly learn new things. In general, digital technologies open new opportunities for improving people's lives and the development of society, but also present challenges and risks, such as personal data protection, cybersecurity. Therefore, it is important to pay attention to the development of digital literacy and competencies of the population to effectively use digital technologies in the field of professional orientation of young people and children, who still have a margin of time to choose their future profession. Using the tools of modern digital technologies, vocational guidance can be fun and easy to set up, which will facilitate the early choice of a future profession at preschool age. Using digital technologies with a game form of activity, it contributes to the early career guidance of older preschool children.

Augmented reality can be an effective tool in the education and career guidance of children, as it helps visualize and apply knowledge in the real world, and not just on paper or in a computer program. Using AR in teaching can help students understand abstract concepts and relate them to real objects and situations. Furthermore, an AR-based play approach can make learning more engaging and motivating for children. A competitive gaming approach based on AR can contribute to more effective education, training, and career guidance. Playfully, students can find and explore various objects in

the real world, solve problems and tasks, and compete. Such an approach can increase the learning interest and motivation of children. However, it must be considered that the use of AR and game approaches in education requires a suitable infrastructure, including access to a suitable technical base and qualified specialists. In addition, effective AR-based learning and play strategies need to be developed so that they can be as effective as possible in achieving educational goals. AR-based games are an effective tool for early career guidance for children [19; 27]. AR applications can be used to research occupations. With AR apps, one can create virtual objects that showcase professions and allow kids to explore them in more detail. For instance, children can use AR applications to explore careers related to nature, architecture, medicine. AR technologies can also be used to create interactive scenarios. Thanks to AR technologies, interactive scenarios can be created that allow children to take part in the simulation of various professions. For example, kids can use AR apps to create their own virtual restaurant and explore culinary-related professions.

The use of AR for the development of preschool children could be in the areas of reading and language development. One can use AR to create interactive books where images come to life and perform real-time actions that preschool children can look at and learn to read. The use of AR technology can help children improve their reading comprehension, as well as develop vocabulary and imagination. The use of artificial intelligence (AI) systems can also be useful for determining career guidance. However, the use of AI in career guidance may have some limitations and potential risks associated with lack of data and possible distortion of results due to system bias [28; 29]. Therefore, it is necessary to apply AI with other methods to get a completer and more objective picture of individual preferences. The use of AI assistants may include the use of AI. Artificial intelligence can be used to create virtual assistants that help kids learn about different jobs. They can answer questions, provide information, and help children choose the right career for them. Artificial intelligence can also be used to analyse the preferences and interests of children to determine which careers may suit them best. This can help children make more informed choices when picking their future profession [30; 31].

The use of AI technologies for preschool children can be useful to create personalized learning programs that are tailored to the level of knowledge and needs of each child 5-6 years old. Augmented reality can be used to create interactive activities and games that help children learn through interaction with virtual objects. Pedagogical design is aimed at creating an integrated approach to the development of the educational environment and learning, which helps flexibly adapt the educational system based on data on learning outcomes, ways of interacting with students, pedagogical technologies and tools used according to the needs of students. When using instructional design, a unique learning trajectory is created, which includes an analysis of the goals and expected educational outcomes, the needs of the target audience, the choice of tools for learning and evaluating the effectiveness of training. The main stages in the development of educational materials include analysis, design and development, application and evaluation [18; 32]. Notably, within the framework of the early career guidance of preschool children, pedagogical design can be used to create special educational programs and projects that will help children better understand their interests and talents, as well as determine their professional preferences.

There are many models of pedagogical design, and the choice of a particular model depends on the goals and objectives of career guidance work with preschool children. However, a general model can be proposed that can be adapted to particular conditions and needs (Table 1). This is a general model that can be adapted to the particular conditions and needs of career guidance work with preschool children.

Table 1. Model of pedagogical design for career guidance of older preschool children

Educational design model for career guidance with older preschool children	
Determining the goals of career guidance work with preschool children	It is necessary to determine what is need to be achieved in the process of career guidance. For example, goals may be related to the development of interests and hobbies in children, acquaintance with professions and their characteristics, development of skills and abilities necessary for future professional activities.
Analysis of the needs and opportunities of preschool children	It is necessary to determine what needs and opportunities children have at the moment, what is already known about professions, what knowledge and skills have already been acquired.
Development of a career guidance program	Based on certain goals and an analysis of the needs and capabilities of preschool children, it is necessary to develop a career guidance program. The program should describe the goals, objectives, methods, and forms of work.
Definition of methods and forms of work	In career guidance work with preschool children, various methods and forms of work can be used, e.g., games, excursions, conversations, theatrical performances.
Evaluation of the effectiveness of career guidance work	It is necessary to evaluate the results of the work and the achievement of the set goals. For this, various assessment methods can be used, e.g., questioning children and parents, observing children in the process of work, analysing the results of game tasks.
Correction of the career guidance program	Based on the evaluation of the results and the achievement of the set goals, it is necessary to adjust the career guidance program and introduce improvements.

Source: compiled by the authors.

Career guidance work with preschool children is aimed at helping children understand their interests, hobbies and inclinations, as well as helping them choose their future profession. In this process, the instructional design model can help educators develop and implement appropriate educational programs and methodologies. The process of early career guidance is an important stage in the formation of the child's personality and his motivation for professional activities in the future. Children begin to realize that work is necessary to achieve goals, both for individual and for society. It is essential to help them understand their interests, hobbies, and opportunities to make the right choice of profession in the future. At this stage, it is especially significant to create an environment that is stimulating and conducive to adaptation, in which the child will get acquainted with various professions, their features, and examples of successful people in various fields of activity. This will help children reach their potential and pick a profession that will match their inclinations and abilities.

Discussion

The modern world is characterized by the rapid pace of technological development, changing requirements for professional skills and abilities. Therefore, it is important to start introducing children to various professions already from preschool age so that they can more consciously choose their future profession and successfully adapt to the rapidly changing world of labour. Furthermore, knowledge of various adult professions helps children better understand the world around them, develop social skills and abilities, develop their horizons and creativity. Many scientists have been investigating this issue, some aspects of whose work are listed below, in comparison with the results of this study. As a result of this study, aspects of early career guidance for children of older preschool age were investigated, which showed the effectiveness of using pedagogical design in symbiosis with the use of digital technologies.

Setuju *et al*. [16] draws attention to the project activities that are used by teachers during blended learning. Within this model, according to scientists, students work on projects that can be related to various subjects or topics, and in work, children use online resources, interact with each other and with teachers, receive feedback, as well as corrections. Using project activities in the classroom, according to researchers, children can get access to added materials and tasks, which helps individualize learning and approach to each student, which positively affects their self-determination. According to the results of this study, the use of project activities for children aged 5-6, which is based on modern digital technologies, is an effective tool not only for developing the skills and abilities of older preschool children, but also contributes to the early career guidance of educators.

A. Gallagher & K. Thordarson [33], studying the issue of the complex application of instructional design and design thinking to improve the educational process, focus on the use of various design thinking tools, such as "characters", "journey maps", "empathy maps", "rapid prototype", to solve particular tasks and problems. The results of this study note the effectiveness of the use of pedagogical design and an integrated approach to the education of older preschool children, considering their self-determination and choice of future career.

I.Y. Maureen *et al*. [34] draw attention to the possibility of using pedagogical design to create and implement literacy lessons for preschool children. Scientists propose a model of instructional design, which includes five stages: needs analysis, design, development, implementation, and evaluation. Researchers note the importance of choosing appropriate teaching methods, using multimedia resources, developing communication skills and supporting the individual progress of each child. The research of scientists emphasizes the importance of a systematic approach and adaptation of the educational process to the specific needs of preschool children using the principles of pedagogical design. Notably, the use of successive stages of the implementation of pedagogical design in the career guidance of preschool children, as shown by this study, is an important and effective educational tool, and therefore it is recommended to use this tool for self-determination of children of older preschool age.

Researchers H. Sasmita *et al*. [35] argue that career guidance is an essential aspect of child education for a child's goal-oriented career path. In this regard, scientists attach importance to the teacher-consultant with questions of vocational guidance for the direction and mentoring of children who are at the beginning of choosing a future profession. It is necessary to agree that the role of the educator in the career guidance of older preschool children is an integral part of the educational process.

According to A.D. Wijaya [36], the issue of career guidance in childhood is indispensable and requires attention from teachers and parents. The scientist argues that a child should be able to get acquainted with various professions, understand their features, requirements, and opportunities to form their idea of a future career. It is necessary to agree with the opinion of the researcher, since it is teachers and parents who can help children in this process, through a conversation about professions, about what they are interested in and what their features are. Furthermore, based on the results of this study, children 5-6 years old can use various games and exercises that will help children understand their inclinations and interests.

C.P. Bhakti *et al*. [17] argue that career readiness is an intrinsic aspect of personality that should be prepared as early as possible. Scientists are inclined to believe that the use of innovative technologies to adapt to modern conditions of preparing children for a career should take place according to the individual characteristics of the individual. It is necessary to agree with the opinion of the researchers, since, based on the results of this study, digital technologies with a game form of activity can increase the effectiveness of career guidance work with older preschool children.

According to a study by S. Mohamed *et al*. [10], early childhood is the best period for choosing a career, since children at preschool age make up a personal understanding of professions, as well as form a general idea about them. Scientists argue that the data that preschool children acquire at an early age about a career, through the information and educational space surrounding them, will be layered throughout their entire life on the basis received in childhood. This statement is true because, based on the results of this study, it is the early beliefs

acquired at older preschool age during play activities that are one of the main aspects in picking a child's professional activity in the future.

R.G. Cinamon & O. Dan [37] argue that an important aspect of successful career guidance is the early introduction of career education. According to researchers, the presence of parental involvement and curriculum in the system of preschool education increases the effectiveness of vocational education at preschool age. Indeed, the multimodal approach at older preschool age, as shown by this study, is an essential element of early career guidance for children aged 5-6.

According to the researchers of the career guidance system using gamification A. Shipepe & A. Peters [38], the use of interactive mobile games in the career guidance process is an effective tool. In addition, the researchers argue that digital games can help students develop decision-making and problem-solving skills, which can be helpful in career choices and in coping with career challenges. Based on the results of this study, it is necessary to agree with the opinion of scientists, since at the older preschool age the game is the leading activity of the child, digital games can interest and help the pre-schooler in self-determination.

In turn, J.L. Knight [39] points out that entry-level career development can have different meanings in different contexts. The researcher argues that this means providing students with opportunities to learn about different professions and career paths, as well as receive support and advice in choosing their future direction. Comparing this statement with the results of this study, since career development at the initial level (in this case, at older preschool age) is an important element of education and preparation for a career, which helps future schoolchildren and students to gain the necessary knowledge and experience for a successful start in your professional life.

L. Bonoli [12] argues that the work of career counsellors involves the provision of professional aid in selecting a career path and developing professional skills. According to the researcher, it is consultants who help participants in the career guidance process understand their interests, values, needs and life goals, as well as provide access to information about professions, the labour market, education, and qualification requirements. During their work, consultants use various tools and methodologies, such as career guidance tests, resume analysis and interviews, as well as modern technologies, such as online job search and professional development services. It is essential to agree with the opinion of the scientist, since, according to the results of this study, a professional counsellor plays a significant role in helping older preschool children determine their career path and develop the necessary skills to achieve success in their professional activities.

Based on the research of scientists and the results of this work, it can be argued that early career guidance at older preschool age is of immense importance. During this period, the foundations of personal development are formed, interest in the world of professions is formed, and there is also a desire to learn more about what adults do. Therefore, early career guidance can become the basis for the further successful professional development of the child.

Conclusions

Early career guidance includes a variety of activities that help children become familiar with different professions and learn about the various aspects of professional work. In early career guidance, methods such as games, competitions, field trips, master classes, conversations with representatives of various professions and other forms of work are used. They help children gain the necessary knowledge about various professions, skills, and abilities that may be useful to them in the future when choosing a profession. It is important to remember that the career counselling process is long and gradual, and children may change their interests and preferences over time. Therefore, it is essential to create conditions for constant acquaintance with various professions and discussions of career opportunities so that the child can make an informed choice in the future.

As a result of this study, various aspects of early career guidance were studied using game formats that can positively influence the choice of a future career. Furthermore, as a result, it was possible to analyse the impact of games on the development of skills and competencies in children of senior preschool age, necessary for their future professional activities. The work explored pedagogical design tools in early career guidance, the use of projects, augmented reality, and artificial intelligence systems, as well as the MeTycoon game, as innovative methods that are useful for older preschool children for self-determination. The study managed to study the main aspects of the periodization of vocational guidance by E. Ginzberg, as well as highlight the earliest period of children's vocational guidance "fantasy". The paper presents the tools of early career guidance that have a positive impact on the future professional self-determination of the child. In this paper, the Lapbook pedagogical design tool was studied, as well as its main tasks and functions in career guidance work with children of senior preschool age. Researchers who will investigate the issues of pedagogical design in the early vocational guidance of children of senior preschool age are recommended to pay special attention to the field of digital models of vocational guidance.

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Conflict of Interest

None.

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Педагогічне проєктування ранньої профорієнтації в ігровій діяльності дітей старшого дошкільного віку

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Анотація

Актуальність. Профорієнтація в дошкільній освіті є важливим аспектом виховання дитини та розвитку у неї навичок, необхідних для подальшої успішної кар'єри та саморозкриття. У зв'язку з цим дослідження професійної орієнтації в ігровій діяльності з використанням педагогічного проєктування є актуальним питанням при вихованні дітей старшого дошкільного віку.

Мета. Метою даного дослідження було вивчення аспектів використання засобів педагогічного проєктування в ігровій діяльності дітей старшого дошкільного віку з ранньої профорієнтації.

Методологія. У роботі використано методи аналізу, порівняння, узагальнення.

Результати. У результаті дослідження вдалося дослідити аспекти проєктної діяльності в ігрових формах ранньої профорієнтаційної роботи зі старшими вихованцями дошкільних навчальних закладів. Також було вивчено періодизацію профорієнтації за Е. Гінзберг. У даному дослідженні розібрано та ретельно досліджено ранній період профорієнтації дитини «фантазування». У дослідженні також представлені варіанти ігрової діяльності в сучасній дошкільній освіті, як елементи ранньої профорієнтаційної роботи з дітьми старшого дошкільного віку. У науковому дослідженні висвітлено інструменти ігрової діяльності під час ранньої профорієнтації дітей старшого дошкільного віку, а саме використання проєкту Lapbook, систем доповненої реальності та штучного інтелекту, а також гри MeTycoon, яка включає відеоматеріали та інформацію про професії.

Висновки. Результати даного дослідження можуть бути використані дослідниками та науковцями, які досліджують питання використання педагогічного проєктування у профорієнтації через гру, а також вихователями дошкільних навчальних закладів, які займаються ранньою профорієнтацією.

Ключові слова: вибір професії; гейміфікація; інформаційний простір; освіта; самовизначення.