THE CHALLENGE OF WORKING WITH GIFTED CHILDREN IN PSYCHOLOGICAL AND PEDAGOGICAL STUDIES OF RESEARCHERS IN WESTERN EUROPE COUNTRIES

Abstract. The manuscript clarifies the problem of creation of conditions for gifted children in Western countries, which is presented from different positions. The urgency of the study of psychological and pedagogical work with gifted children is determined by several circumstances: the state's awareness of "human potential" as the main resource of its development; increase in information and emotional loads per person by a lot of problems, the solution of which requires huge intellectual efforts; requirements of the society to the professionalism of the individual, which must be creative, active, socially responsible, with developed intellect, educated, etc. Among the global trends of the world education system in the 21st century, scientists stand out the orientation toward the "average student", increased interest in gifted children, to the specifics of the disclosure and development of their abilities in the process and the means of education. In this regard, the task of the pedagogical community is to direct all efforts to identify gifted children and create conditions for their successful development.

Keywords: Giftedness, specialized school, creativity, intellect, method of gifted children teaching, socialization of gifted children, acceleration, intensification, individualization, differentiation.

In the Renaissance, a study of the nature of giftedness was carried out by the Spanish scientist Juan Huarte, who considered individual differences in abilities for the purpose of further professional selection.

The representative of the era of enlightenment, the English educator John Locke put forward the theoretical position "the process of cognition arises in experience and on the basis of experience, the human mind is a" pure board". Most scientists of the era of enlightenment insisted on the idea that "each person can be developed to the highest degree of genius, it's all in the conditions in which he turned out to be."

At the end of the nineteenth century, an empirical approach to the study of giftedness made it possible for the English scientist Francis Galton to put forward the idea that "outstanding abilities are the result of the action of hereditary factors [1, 2].

At the beginning of the 20th century, the term "intellectual giftedness" was introduced in psychology and then in pedagogy, it was associated with the name of the French psychologist A. Binet [3,4]. Such followers of A. Binet as L.Terman [1916], R.Maylee [1928], J.Raven, R.Amthauer [1936], R.Kettel [1958] improved the techniques, created new test tasks for the definitions of the "intelligence coefficient".

V. Stern gave a broad definition of intellectual giftedness, which distinguishes the orientation of thinking by the distinctive features of intellectual giftedness [5]. In the presentation of V. Shtern, the concept of giftedness is not limited only to the intellect and distinguishes the general giftedness. He gave the following definition of giftedness: "Mental giftedness is the general ability to consciously direct your thinking to new demands, there is a general mental ability to adapt to new tasks and conditions of life."

This characteristic of giftedness contributed to the development of levels of differentiation of giftedness.

L.Terman put forward the idea that in different spheres of activity it is not the intellect of IQ that is required, but the more complex qualitative peculiarity of the psyche that is capable of generating original
ideas, that is, "creativity". The study of problems of productive thinking in Western European and American psychology dealt with J. Gilford [6], K. Dunker [7], V. Keller [8], C. Koffka [9], P. Torrance [10] and others.

The model of the structure of intelligence developed by J. Gilford has created the possibility of a new understanding of creativity as a universal, cognitive ability. The key moment for the psychology of giftedness was the difference he introduced between two types of thinking: convergent and divergent. As a result of this study, J. Gilford's ability to converge thinking began to be identified with the test intelligence measured by the IQ system, and the ability for divergent thinking - with creativity. Therefore, testing of the main parameters of divergent thinking can be considered as a way of diagnosing creativity.

Testing creativity has created a desire to determine whether there is a connection between intelligence and creativity. In the studies of J. Gilford and E.T. Torrens, a high positive correlation between the level of IQ and the level of creativity was revealed, the higher the level of intelligence, the higher the probability that the subject will demonstrate high rates in creativity tests. At the same time, it was revealed that some respondents may have low rates for creativity tests, but it is especially interesting that at low IQ values, high divergent productivity is not observed.

Different concepts were developed by foreign researchers who formulated their approaches to the definition of giftedness and, consequently, to the identification and teaching of gifted children. B. Bloom, J. Gallagher, G. Gardner, J. Davidson, B. Clark, R. Cattel, G. Passow, J. Renzulli, R. Stemberg, J. Stanley, L. Terman, L. Terstone and others.

Based on the ideas of psychologists J. Carroll and B. Bloom, a methodology for teaching gifted children was developed. The study of specially gifted children was done by J. Bruno [11] ("Gifted children: psychological and pedagogical research and practice"). He believed that "averaging" of a gifted child, a decrease in the overall intellectual and creative potential is accompanied by the presence of pronounced neurotic phenomena. In his opinion, the feeling of creative insolvency is the reason for neurotic and even psychopathic personality development.

J. Gilford, P. Torrens, F. Barron, K. Taylor and others contributed to the unification of theoretical studies on the psychology of individual differences and practical work on the development of curricula in the field of differential education. In his studies, J. Gilford pointed out that many gifted children sometimes experience severe depression, hide from peers and adult soviet, experience "discrimination" due to the lack of differentiated education, because of the school's orientation toward the average student, due to the excessive unification of programs (S. Marland, 1972).

Research P. Of Torrens showed that gifted children quickly pass the initial levels of intelligence development and resist all types of uncreative work. Insufficient psychological level of teachers for working with children leads to a conflict of children with teachers, causes them hysteria, inability to follow the accepted patterns. The complexity of communicating with gifted children, according to P. Torrance was the low level of training teachers who are not able to work with gifted children.

To better understand the problems of socialization of gifted children, a great contribution was made by L. Hollingworth, who identified the following problems of gifted children:

- Negative attitude, dislike for the school is manifested by the fact that the curriculum is boring and uninteresting for gifted children, the curriculum does not correspond to their abilities.
- The dissatisfaction of gaming interests leads to the isolation of the child, who withdraws into himself. As a gifted child expects complex games.
- Gifted children are not prone to conformism, especially when the proposed standards are contrary to their interests.
- Gifted children are immersed in philosophical problems. They are characterized by such phenomena as the study of such phenomena as death, life, religious beliefs and philosophical problems.
- Mismatch between physical, intellectual and social development. Gifted children often prefer to communicate with older children. Because of this, it is sometimes difficult for them to become leaders.
- For gifted children, there is an inherent need for perfection. Hence the feeling of dissatisfaction, own inadequacy and low self-esteem.
- Need for attention of adults. They can repel others with remarks expressing contempt or impatience.

Scientists cannot give a single definition of the phenomenon of giftedness, because the indicators are different and they are complex, versatile and multilevel.
The science data leave no doubt that the level and character of the development of giftedness is the result of a complex interaction in the process of cognitive and practical activity of many factors: heredity (natural makings), social conditions, personal qualities of students.

Gifted children from an early age have a high level of self-learning ability, so they need not so much targeted training as to create a varied, enriched and individualized educational environment.

Specialized, integrated curricula for working with gifted children are being developed in specialized schools. Within the framework of these programs, students "move" freely than in the ordinary program. Schools in many countries are rebuilt in the direction of differentiated education. They practice individualized ways of working on "training contracts", they allow the teacher to save time, and students - to work at an individual pace. At the same time, the high structuredness of the lesson, the ability to see the subjects studied in a system of various connections, helps a gifted child to see the whole picture of the studied world.

A number of principles are considered in the construction of the content of teaching gifted children [12, p.27-30].

1. Acceleration is a strategy to increase the pace of the training material. Within the framework of this strategy, gifted children are trained in accelerated classes, and they can pass, for example, from the first grade to the third or fifth year, etc., during one academic year.

2. Intensification - this strategy involves increasing the amount of learning material, increasing the intensity of training and is considered an alternative to the acceleration strategy.

3. Individualization of teaching is considered as the main strategy for developing the content of education of gifted children. Within the framework of individualization programs for gifted, talented children are considered.

4. Development of social competence - the development of programs aimed at developing the emotional and behavioral sphere of the child.

5. Research training is the main task to intensify learning, giving it a research, creative character and transferring the initiative to the student in organizing his cognitive activity. Independent research practice is the main factor in the development of children's creative abilities.

6. Differentiation of education is based on the main, leading characteristics of a gifted child: the development of productive thinking, independence, independence, a propensity for leadership, intellectual and creative abilities, mental abilities, etc.

7. Separate education is a conditional name of the path, which implies the creation of social schools for gifted and talented children, built on different approaches to the problem of differentiation of education, for example, physical and mathematical schools, linguistic schools, etc.

8. Co-separate education - the availability of classes of different levels of education.

9. Co-education - teaching gifted children in conjunction with their "normal" peers.

Let's consider the different programs for gifted children in which author's approaches to the implementation of psychological and pedagogical support programs for gifted children in the context of specialized schools are presented. Within the framework of differentiated education, the most famous programs for working with gifted children are the method of complete assimilation of J. Carroll and B. Bloom, the S. Kaplan program, the pedagogy of individualization R. Cousine, the "Free class of Guildford", "Three types of enrichment of the curriculum" by Renzulli and "Taxonomy of learning objectives" Bloom.

In the opinion of S. Kaplan (USA) it is necessary to withstand the following requirements: the global, fundamental nature of topics and problems studied by students; interdisciplinary approach in the formulation of problems; Integration of topics and problems related to different fields of knowledge; content saturation; focus on the development of productive, critical thinking. Particular attention is paid to the development of personal interests and the preference of children, the creation of conditions for independent choice of learning problems. In the curriculum of S. Kaplan there are 2 basic methods of teaching gifted children: deductive and problem research. In deductive research, the main task is to help gifted children move from a review, remember the studied, stimulate the interest of children to study information, to get acquainted with the general hypothesis.

At the initial stage, the teacher presents the general idea (problem) that is to be studied, while the students put forward their own hypotheses and ideas, conduct research, gather information to prove or disprove the hypothesis, summarize and plan further work.
Consider the curricula developed on the basis of the "methodology of full assimilation" by J. Carroll, B. Bloom. Scientists have proposed to record the results of training. In this case, the lessons create conditions for students to achieve the expected result. This approach was developed and developed by B. Bloom. He proposed a system of instruction where each student, according to his individual characteristics, will move a certain pace of learning, not with averaged, but with conditions that are optimally matched for a given student. Thus, B. Bloom's method presupposed studying the ability of students in conditions when the time for studying the material is not limited. B. Bloom singled out the following categories of students:
- inadequate students who are not able to reach the intended level of knowledge and skills, even at high educational costs;
- talented students (about 5%) who perform tasks in a high tempo and difficulty level;
- ordinary students (about 90%), whose ability to absorb knowledge and skills are determined by the costs of study time.

According to the method of B. Bloom, 95% of students will be executed when removing rigid time frames. So most students can fully understand the entire content of the training. On the basis of a model for the full assimilation of the content of instruction, students at a sufficiently high level must achieve the learning outcomes of the majority of students. Implementing this theoretical approach, J. Bloch, L. Anderson, and others developed a teaching methodology based on the complete assimilation of the content of instruction. To implement this technique, the following steps were supposed to be performed:

1. Introduction - the orientation of students in the work on the teaching method based on complete assimilation;
2. Training for each of the training units in the direction of full assimilation;
3. An estimation of completeness of mastering of a material as a whole at each of pupils; clarification of the value of the assessment for each student.

When implementing the technique of B. Bloom, the learning process is divided into blocks. A special feature of the technique is the precise definition and formulation of the criterion for complete assimilation. The basis of the criterion is the specific goals of the course. The criterion is expressed in two ways:
- through a clearly defined description of the student's actions;
- through an indication, the required number of correct answers.

As studies have shown, fixing this level gives stable positive results; most students retain the interest in the subject and the positive attitude towards learning.

Thus, most foreign researchers tend to maximally individualize the child's educational activity in one way: to develop individual curricula and educational programs for each student, based on his individual capabilities and characteristics.

American psychologist J. Renzulli describes the algorithm of the teacher's activity in an individual approach. The teacher [13, p.287]:
- determines the level of development of the child (including its quality and ability);
- outlines long-term and short-term goals and ways to achieve them;
- determines the time that the child should spend on mastering a standard and special program;
- provides for the participation of parents;
- determines ways of assessing the child's success.

He points out the directions of pedagogical work on the development of giftedness as a combination of three characteristics: intellectual abilities (exceeding the average level of intelligence), creativity and perseverance (motivation, task-oriented). According to Renzulli's "Three Types of Enrichment of the Curriculum," the thesis is rejected that the potential of gifted children can be realized by simply intensifying the assimilation of the same material that is intended for children with average abilities. The program is aimed at achieving two main goals: the curriculum allows students to devote most of the time to those activities that are of greatest interest to them, and the main task of the teacher is to help each student to set themselves feasible tasks that meet his interests, and master the methods and research skills necessary to solve these problems. Renzulli suggested working on an "enriched teaching method" as "going beyond the established curriculum and outstripping it."

The Bloom model of education "Taxonomy of Learning Goals" focuses on the cognitive functions of gifted children. Comparing the goals in the curriculum with the expected results, teachers can determine
the types of assignments and additional objectives for inclusion in their curriculum. The main feature of the model is to ensure the effectiveness of training. The analysis of this model allowed to reveal that training on this model, promotes the development in children of the abilities to memorize, comprehend and solve problems.

In specialized schools, working with gifted children is a long and complex process. Teachers and psychologists need perfection of mastery, self-education, creativity, mobility. To ensure the effectiveness of psychological and pedagogical support of the process of working with gifted children, teachers need to constantly improve their qualifications in the subject taught, as well as in psychology, physiology and pedagogy, and participate in long-term seminars on giftedness issues.

The problem of working with gifted children is examined in several psychological and pedagogical aspects:
- development of conceptual psychological and pedagogical approaches to the organization of work with gifted children;
- studying the strategy, content, forms and methods of working with gifted children;
- identification, diagnosis, prognosis, formation, training and development of gifted and talented children;
- ensuring the formation and development of professional and personal readiness of teachers and psychologists to work with gifted children in the context of specialized schools;
- developing programs of work with gifted children;
- creation of an innovative educational environment for the development of children's giftedness.

Thus, in the modern psycho-pedagogical science, prerequisites for the scientific and practical solution of the problems of ensuring the effectiveness of psychological and pedagogical support for gifted children have developed. It is very important to create a favorable psychological environment for the gifted child, which will help to bridge the gap between intellectual and personal development and will contribute to their development. Teachers and psychologists need to work with gifted children in three ways:
- development of the child's intellectual abilities;
- formation of adequate self-perception;
- assistance in the adaptation of the child and the acquisition of constructive forms of communication with peers and adults. It is necessary to help parents and the child correctly organize educational activities.

At the same time, it should be noted that the issues of ensuring conditions for the development of gifted children, taking into account individual characteristics, taking into account different types and levels of giftedness, remain poorly studied, and at the same time, an important task in the study of giftedness is to study the problem of working with gifted children in specialized schools.

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БАТЫС ЕЛДЕРІ ГАЛЫМДАРЫНЫҢ ПСИХОЛОГИЯЛЫҚ-ПЕДАГОГИКАЛЫҚ ЗЕРТГЕУЕРІНДЕ ДАРЫНДЫ БАЛАЛАРМЕН ЖҰМЫС ЖАСАУДЫҢ МӘСЕЛЕСІ